ISSUES OF INTERNATIONAL POLICY COORDINATION: TRADE AND COMPETITION POLICIES AND THE ROLE OF THE WTO

BY

GALINA BELOKUROVA

THESIS

Submitted to
KDI School of Public Policy and Management
in partial fulfillment of the requirements
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ABSTRACT

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The interrelationship between trade and competition policies is definitely unique when one realizes that both are concerned with trade. The difference lies in antitrust disciplines' dealing with private firms as objects, while trade policy formulation is still a prerogative of a nation-state. Competition policy is concerned mostly with consumer welfare, while trade policy may be motivated in various ways: from maximizing national income and / or political economy considerations to using a trade agreement as an external pressure for dealing with conflicting domestic interest groups. In any case, the closeness of competition and trade policies has induced policy-makers to include provisions on competition into some of the WTO Agreements that are currently in force. Interestingly, despite all those differences in approach to trade enumerated above the existing trade theory has already incorporated the main assumptions of "structural competition" theory, which can be clearly illustrated by the WTO "competition policy" provisions. This approach, however, may appear to be biased as the Cordato's "dynamic competition" vision suggests.

Dedicated to *Woo Chul Chung*

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TABLE OF CONTENTS

INTRODUCTION - 10

1. EXTERNALITIES AND THEORY OF POLICY COORDINATION - 22

1.1 EXTERNALITIES ASSOCIATED WITH NATIONAL POLICY CHOICES: HOW DO THEY TRAVEL? - 22

1.2 PRACTICAL IMPLICATIONS FOR POLICY COORDINATION - 27

1.3 PRIVATE PARTIES' REGULATION UNDER THE WTO - 40

2. SHOULD WE USE ANTITRUST THEORY IN INTERNATIONAL TRADE? - 44

2.1 AN ALTERNATIVE TO ANTITRUST IN INTERNATIONAL TRADE - 44

2.2 MARKET STRUCTURES AND INTERNATIONAL TRADE REGULATION: THE SHORTCOMINGS OF ANTITRUST - 46-

2.3 THE INTERACTION BETWEEN TRADE AND COMPETITION POLICIES IN NEOCLASSICAL SETTINGS - 67

3. TRADE THEORY PERSPECTIVES - 73

3.1 THE BALANCE OF CONCESSIONS, "BENEFITS ACCRUING", RECIPROCITY, NON-DISCRIMINATION - 73

3.2 THE PURPOSE OF TRADE AGREEMENTS - 87

3.3 TRADE POLICY TOOLS - 104

3.4 GATT / WTO LEGAL PRACTICE AND COMPETITION POLICY CONSIDERATIONS: MARKET ACCESS REVISITED (JAPAN – SEMICONDUCTORS) - 123

CONCLUSION - 145

REFERENCES - 147

APPENDICES - 159

LIST OF FIGURES

1. DYNAMIC VERSUS STRUCTURAL COMPETITION
2. BAGWELL AND STAIGER VIEW ON INTERACTIONS BETWEEN TRADE AND COMPETITION POLICIES
2.1. COMPLEMENTARITIES IN TRADE AND COMPETITION LAWS - 1
2.2. COMPLEMENTARITIES IN TRADE AND COMPETITION LAWS -2
3. NEOCLASSICAL IMPORT DISCIPLINE HYPOTHESIS
4. RECIPROCITY CONCEPT
5. THE PURPOSE OF TRADE AGREEMENTS: competition of governments
6. THE PURPOSE OF TRADE AGREEMENTS-2
7. POWER-BASED AND RULE-BASED APPROACHES TO TRADE NEGOTIATIONS
8. ENFORCEMENT OF THE WTO AGREEMENTS
9. EQUIVALENT WITHDRAWAL OF CONCESSIONS AND RETALIATION
10. MARKET ACCESS REVISITED

LIST OF CHARTS

1. CHART 1: ENFORECEMENT AND RETALIATION – 1 116

2. CHART 1: ENFORECEMENT AND RETALIATION – 2 118

INRODUCTION

International policy coordination has long been in the center of scientific scrutiny because of its immutable importance. It is clear that policy choices produced by the governments can often cause adverse influences on their trading partners' economic performance, thus all concerned parties call for closer international cooperation in order to avoid the transmission of negative externalities throughout the world economy. Moreover, not only government conduct could be a cause of national markets' foreclosure: private behavior is now often perceived as such[1].

The lack of an adequately equipped international institution with strong capabilities to provide reliable enforcement had been impeding development of multilateral forum on international policy coordination for more than fifty years despite growing perception that there should be one. The problem is still unresolved. The emergence of the WTO in 1995, the first multilateral institution with routinely working dispute settlement mechanism, has provoked an increased interest of policy-makers, who tried to explore on the possibility to use similar "legalistic" approach in other areas. The possibility and desirability of the WTO dispute settlement's usage in areas adjoining

[1] Eleanor Fox "Competition Law and the Millennium Round", *Journal of International Economic Law*, 665-679, 1999.

trade policy and potentially capable to influence it, has been among the issues raised by the public service community[2]. Nevertheless, very few works considered international policy coordination in its unity. Most commonly the interactions between trade, competition, environmental and labor policies are reckoned separately without appropriate consideration of connected policy realms.

In author's view, the most comprehensive theoretical framework developed thus far in the literature is presented in the works of Bagwell and Staiger[3]. A hypothesis

[2] The problem of international policy coordination is relatively new, but nevertheless, it has received a considerable attention. Among recent works in the field are Bagwell, Kyle and Robert W. Staiger, "Do mestic Policies, National Sovereignty, and International Economic Institutions," *Quarterly Journal of E conomics*, May 2001, pp. 519-562; Bagwell, Kyle and Robert W. Staiger, "Competition Policy and the WTO", NBER, first draft, 2001; Bagwell, Kyle and Robert W. Staiger, "Domestic Policies, National So vereignty, and International Economic Institutions", *The Quarterly Journal of Economics*, May 2001; I gnacio de Leon, "Should We Promote Antitrust in International Trade", World Competition, December 1998; Carmen Otero Garcia-Castrillon, "Private Parties under the Present WTO (Bilateralist) Competiti on Regime", Journal of World Trade 35 (1): 99-122, 2001; Richard Damania, Per G. Fredriksson, "Trad e Policy Reform, Endogenous Lobby Group Formation and Environmental Policy", *Journal of Econom ic Behavior & Organization*, Vol. 52 (2003) 47–69; Roberto Burguet and Jaume Sempere, "Trade libera lization, environmental policy, and welfare", Journal of Environmental Economics and Management 46 (2003) 25–37, Bernard Hoekman, "Competition Policy and Preferential Trade Agreements", *World Ban k Working Papers*, 2002; Bernard Hoekman, "Competition Policy and Global Trading System: A Devel oping Country Perspective", *Policy Research Working Paper*, 1735, World Bank, March 1997, Lee Mc Gowan, "Protecting Competition in a Global Market: A Pursuit of International Competition Policy", E uropean Business Review Volume 98 · Number 6 · 1998 · pp. 328–339; Joel Davidow, "Antitrust Issues Arising Out of Actual or Potential Enforcement of Trade Laws", Journal of International Economic La w (1999), 681 – 693 and many others.

[3] Bagwell, Kyle and Robert W. Staiger, "Domestic Policies, National Sovereignty, and International Economic Institutions", *The Quarterly Journal of Economics*, May 2001

developed by them was taken as a basis for critical research in this paper and the conclusion appears to be dubious with respect to the whole neoclassical and "structural" paradigm.

Bagwell and Staiger made a special accent on the transmission of adverse policy effects within the global economic system, where the main tool appears to be relative world price. Standardization policies, which comprise equally environmental and labor standards, are, on the other hand, responsible for determining the elasticity of import supply to the home country[4]. This essay argues, however, that there are other aspects of international trade system that may hardly be explained by this hypothesis and that are extensively investigated in the works of competition and trade lawyers, although in a qualitative fashion[5].

Most importantly, the focus on a "fixed" relative world price, which comes through reciprocal concessions of the Member governments and the obligation of non-discriminatory treatment, implicitly suggests that governments should determine trade

[4] Bagwell, Kyle and Robert W. Staiger, "Competition Policy and the WTO", NBER, first draft, 2001; Bagwell, Kyle and Robert W. Staiger, "Domestic Policies, National Sovereignty, and International Economic Institutions", *The Quarterly Journal of Economics*, May 2001

[5] Joel Davidow "Antitrust Issues Arising out of Actual or Potential Enforcement of Trade Laws", *Journal of International Economics and Law*, pp. 681-693, 1999

volumes (how else the unique relative world price could be attained?). However, as it was convincingly shown in *EC - Oilseeds*[6], "***the commitments they [governments] exchange in negotiations are commitments on conditions of competition for trade, not on volumes of trade".*** This view was later upheld in the WTO jurisprudence as well in *Japan – Film*[7] case.

Granting concessions on trade volumes is an unattainable task for governments: economic forces determining trade flows are beyond any regulatory effort. In which particular way the trade flows will be structured depends not only on policy choices made by national governments, but mostly on the performance of private economic operators and their ability to compete. The economic model of the WTO proposed by Bagwell and Staiger is missing this part. On the other hand, this issue is widely discussed among policy-makers, for example, within the WTO Group on the Interaction between trade and Competition Policies[8] in a more practical and legalistic way.

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[6] EC – Oilseeds I (GATT), *Report of the Panel, L/6627 – 37S/86, 25 January 1990, para. 150*

[7] *Japan – Measures Affecting Consumer Photographic Film and Paper*, Report of the Panel, WT/DS44/R, 31 March, 1998

[8] [8] Eleanor Fox "Competition Law and the Millennium Round", *Journal of International Economic Law*, 665-679, 1999.

Therefore, the main conclusion derived by Bagwell and Staiger that globally efficient policy choices could be achieved exclusively through selection of tariffs may be less general than it was claimed. The model therein implicitly implies that main objects of the international trade system are sovereign governments, nation-states, and only they can alter relative world price through their policy choices. In existing world economy, this is indeed not the case, and actual policy-makers clearly understand that. Theoretical explorations on interactions between trade and competition policies are falling far behind actual policy developments, and that might be one of the reasons why recent Cancun Ministerial failed to produce any kind of agreement. The analysis provided in this paper

The main purpose of this paper is to evaluate the plausibility of more comprehensive policy coordination under the WTO focusing on "horizontal" interactions between trade and competition policies. Government policies, having a potential to generate cross-border externalities, may be roughly divided[9] into the two big groups. The first group includes *inherently domestic* policies, which stay within the full discretion of national governments, and which form domestic economic environment.

[9] This kind of division is of course not absolute: it is presented here mostly for analytical purposes.

The second group comprises those, which are intended to regulate cross-border flows of people, money and goods. Policies from these groups would potentially differ in their influence on international trade.

The first group definitely includes measures[10] that establish national standards (sanitary, technical, environmental, and labor), the level of intellectual property protection, industrial, fiscal policy and "domestic" part of investment policies[11]. Violations, nullification or impairment caused by externalities generated by the policies of this group are likely to involve in the first place Article III (National Treatment), Article XI (The General Prohibition of Quantitative Restrictions), Article X (Transparency), also Article I (MFN)[12], and some other more specific provisions. All those cases fit the Bagwell and Staiger's model.

The second group of policies accommodates those contemplated to regulate cross-border flows of people, financial resources and goods and presumably include the control over the state of national accounts (monetary policy), as well as migration policy, trade policy, and "outer" part of investment policy. Competition[13] or antitrust

[10] The definition of "a measure": any effective governmental action, whether legally binding or not.

[11] Strategic export subsidies, infant industry protection and "industrial targeting", for example

[12] In the context of access to the domestic market together with Article XIII (Non-discriminatory Administration of Quantitative Restrictions)

[13] In accordance with European (competition) and American (antitrust) definitions

policies' location is somehow intermediate in the proposed classification. On the one hand, antitrust policies have been ever perceived and are still considered as domestic regulations, the main purpose of which is to protect consumer welfare. Even today in many countries including some Members of the European Union, export cartels that harm consumer welfare outside national borders, are exempt from the coverage of the national antitrust laws, which prohibit horizontal price fixing in general[14].

Recent developments and globalization of world economy have made private economic operators influential enough to affect world prices independently mostly through TNC activities. Those powerful forces make nation-states impinged by uncontrolled dynamics of the world marketplace. Thus, governments are still capable to negotiate reciprocal and non-discriminatory agreements, but the real-life market situation concurrently strongly depends on the patterns of private conduct. This is the basic reason, why some Member-countries in the WTO are so much concerned with the problem of devising some internationally accepted antitrust rules, in particular concerning the hard core cartels[15].

[14] Phedon Nicolaides, "Competition Policy in the Process of Economic Integration", *World Competition*, December 1998, pp. 117 - 139

[15] EC represents the most notorious promoter of this vision.

Common concern, however, does not mean that there exists any shared vision on appropriate competition policies. Even the prohibition of hard core cartels and export cartels is not considered as the common place in antitrust policy. In fact, as the United States allied with EC on the issue of competition policy's introduction into the current (Doha Round) WTO negotiating agenda, the failure of Cancun Ministerial showed that it was obviously a premature movement.

Definitely, export subsidies were not the only reason, why Cancun Conference failed to produce an agreement: the EU's insistence on negotiating in new areas such as investment rules and competition policy also had a detrimental effect. Finally, in seeking to woo developing countries, Washington has distanced itself from the EU by calling for elimination of export subsidies and for shelving or dropping competition and investment policies agenda[16]. Although the EU offered at the Cancun Ministerial to ditch its demands for competition and investment rules, it has since appeared reluctant to abandon them altogether.

The interrelationship between trade and competition policies is definitely unique when one realizes the simple fact that both are concerned with trade. The difference

[16] *Financial Times*, January 12 2004

lies in antitrust disciplines' dealing with private firms as objects, while trade policy formulation is still a prerogative of a nation-state. Competition policy is concerned mostly with consumer welfare, while trade policy may be motivated in various ways: from maximizing national income and / or political economy considerations to using a trade agreement as an external pressure for dealing with conflicting domestic interest groups. In any case, the closeness of competition and trade policies has induced policy-makers to include provisions on competition into some of WTO Agreements that are currently in force.[17] Interestingly, despite all those differences in approach to trade enumerated above the existing trade theory has already incorporated the main assumptions of "structural competition" theory, which can be clearly illustrated by the WTO "competition policy" provisions listed below. This approach, however may appear to be biased.

"Competition policy provisions" include:

1. The Agreement on Technical Barriers to Trade, which contains detailed rules regulating the adoption of technical regulations and conformity assessment procedures by non-governmental bodies to ensure that they are not more trade restrictive than necessary;

[17] Michael J. Trebilcock and Robert Howse, *The Regulation of International Trade*, 2nd Edition, Routledge, London – New York, 2000

2. The Understanding on the Interaction of Articles XVII of the GATT, which provides for control over the conduct of state trading enterprises;

3. The Agreement on Safeguards requires Member States not to encourage or support the adoption or maintenance by public or private enterprises of equivalent non-governmental measures to voluntary export restraints;

4. The General Agreement on Trade in Services includes rules designed to ensure that monopolies and exclusive service suppliers do not nullify or impair obligations and commitments under the GATS, particularly where monopolies are also active in related competitive market segments. The 1997 Plurilateral Agreement on basic Telecommunications Services incorporates regulatory principles aimed at preventing anti-competitive practices by major suppliers[18] and ensuring that the interconnection practices of such suppliers do not impede market access and meet non-discrimination requirements;

5. The TRIPS Agreement permits the application of competition policy to abuse of intellectual property rights, including compulsory licensing;

6. The Agreement on Government Procurement regulates tendering procedures so as to ensure optimum effective international competition and addresses certain competition problems such as collusive tendering.

[18] Such as anti-competitive cross-subsidization, use of information obtained from competitors, and withholding technical and commercial information

This unique position of competition policy with respect to the international trade system has inspired me to structure this paper around the basic interactions between trade and competition policies with some non-exhaustive consideration of environmental and labor standards, as well as investment regulations related to trade.

It is not the goal of this piece to provide a comprehensive picture of international policy coordination. Rather, I try to analyze the feasibility of traditional antitrust analysis' application toward trade policy in general and within the WTO legal practice, in particular. From this angle, the task of policy coordination could be represented using the concepts of "market access", "benefits accruing" and "competitive relationship" between domestically produced and imported goods and services.

Within this framework the discussion is structured as follows:

1. The first chapter is dealing with broader theoretical approaches to international policy coordination in neoclassical and institutional settings (illustrated by figures 2.1, 2.2 and 3 of the Appendices).
2. The second chapter is covering competition policy issues. It is focused on the concepts of "market access", "benefits accruing" and "established competitive

relationship between domestically produced and imported products” as the basic pillars of contemporary trading system (illustrated by figures 1, 2, 2.1, 2.2, 3 of the appendices).

3. The third chapter discusses the issues of trade policy and the influence of antitrust concepts on them (illustrated by figures 4-11 of the appendices).

1. EXTERNALITIES AND THEORY OF POLICY COORDINATION

1.1 Externalities associated with national policy choices: how do they travel?

The relationship between trade policy on the one side and competition, labor and environmental policies on the other, has become an object scholastic attention comparatively recently. Competition policy is obviously located at the center of debates on the appropriate scope of the WTO. Member countries are now considering the desirability of broadening the WTO's orientation beyond the realm of conventional trade policy measures including labor and environmental standards as well as competition policy concerns. Nevertheless, before proceeding toward policy coordination, it is necessary to outline economic foundations of the GATT / WTO.

The economic foundations of the GATT / WTO were extensively investigated in the works of many trade policy scholars, including Kyle Bagwell and Robert Staiger, James Levinson, Henrik Horn, Alan Sykes, Jagdish Bhagawati, Drusilla K. Brown, Alan V. Deardorff, and Robert M. Stern, Martin Richardson, Sadao Nagaoka, Oliver

Cadot, Jean-Marie Grether and Jaime de Melo, and many others.[19] Their scientific inquiries have not delivered thus far a commonly shared framework for economic analysis of policy interactions. As Kyle Bagwell and Robert W. Staiger admitted in their article "*An Economic Theory of GATT*"[20], "the economists have not yet developed a unified framework that interprets and evaluates the principles that form the foundation of the GATT". The interaction of WTO trade policies with adjoining realms of regulation is even less developed field of research. Anyway, a bunch of valuable insights is already at the disposal of scholars concerned with other dimensions of contemporary trading system, such as legal enforcement, practice of

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[19] Bagwell, Kyle and Robert W. Staiger, "An Economic Theory of GATT," *American Economic Review*, XCIX, March 1999, pp. 215-248; Bagwell, Kyle and Robert W. Staiger, "Domestic Policies, National S overeignty, and International Economic Institutions," *Quarterly Journal of Economics*, May 2001, pp. 519-562; Horn, Henrik and James Levinsohn, "Merger Policies and Trade Liberalization, " *Economic J ournal*, April 2001, pp. 244-276; Levinsohn, James, "Competition Policy and International Trade," in J agdish Bhagwati and Robert E. Hudec (eds.), *Fair Trade and Harmonization: Volume 1 (Economic An alysis)*, pp. 329-356, The MIT Press, Cambridge MA, 1996; Richardson, Martin, "Trade and Competiti on Policies: Concordia Discourse?" *Oxford Economic Papers*, 51(4), 1999, pp. 649-664; Bhagawati, Ja gdish, "The Demands to Reduce Domestic Diversity among Trading Nations," in Jagdish Bhagawati an d Robert E. Hudec, eds., *Fair Trade and Harmonization: Prerequisites for Free Trade?*, Volume 2 (Leg al Analysis), (Cambridge, MA: the MIT Press, 1996); Drusilla K. Brown, Alan V. Deardorff, and Robert M. Stern, "International Labor Standards and Trade: A Theoretical Analysis," in Jagdish Bhaga wati and Robert E. Hudec, eds., *Fair Trade and Harmonization: Prerequisites for Free Trade?*, Volume 1 (Economic Analysis), (Cambridge, MA: the MIT Press, 1996), Oliver Cadot, Jean-Marie Grether and Jaime de Melo, "Trade and Competition Policy: Where do we stand?", *Journal of World Trade*, March 2000; Sadao Nagaoka, "International Trade Aspects of Competition Policy", NBER Working Paper Ser ies, Working Paper 6720, September 1998, etc.

[20] Kyle Bagwell and Robert W. Staiger, "An Economic Theory of GATT", the American Economic Review, Vol. 89, No.1 (Mar., 1999), 215-248

multilateral negotiations and dispute settlement, thus they have a potential to be applied in other areas of WTO policy research.

As it was mentioned in "*Competition Policy and the WTO*" of Kyle Bagwell and Robert Staiger, "the foreign government is only interested in the competition policy choices of the home government to the extent that these choices affect *market access* afforded to foreign exporters. As a consequence the international inefficiency associated with non-cooperative Nash policy choices takes a simple form: *insufficient market access*."[21]

The overall framework worked out within neoclassical approach to legal environment provided by the GATT and WTO [22] presupposes that the interaction among competition, standardization and trade policies travels practically exclusively through the "terms-of-trade" externality. Thus, it could be claimed that there is actually no need to infringe on national sovereignty of Member governments to attain the goals of efficient multilateral trading system[23]. Within standard trade theory analysis[24], the

[21] Kyle Bagwell and Robert Staiger, "Competition Policy and the WTO", First Draft: August 17, 2001

[22] Kyle Bagwell and Robert W. Staiger, "An Economic Theory of GATT", the American Economic Review, Vol. 89, No.1 (Mar., 1999), 215-248

[23] Kyle Bagwell and Robert Staiger, "Domestic Policies, National Sovereignty, and International Economic Institutions', *The Quartery Journal of Economics*, May 2001

[24] The analytical setting is classic: two-country and two-good model, and only one government is

"foreign" government was "allowed" to choose only its trade policy (tariff rates), but when it is no more the case, in the meaning that if a foreign government can pick its domestic standards as well, "an interesting new issue arises. This issue concerns the channels by which the policy choices of one country can affect that country's trading partners in the presence of non-competitive firms, and it is an issue that does not arise under the perfectly competitive environment considered in Bagwell and Staiger (2001)."[25] The additional source of inefficiency in this case goes through the *changes in domestic elasticity of supply*, affected by the choices of foreign country's standards. "Domestic policy choices effect the *slope* of the foreign export supply curve even while holding the position of the foreign export supply curve fixed at the original world price,"[26] The same is true for foreign policy choices as well, especially in the realm of *inherently domestic policies*.

Changes in domestic elasticity of supply are likely to affect long term market dynamics in a way that would harm the level of negotiated market access on a greater

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allowed to chose its competition policy options, while in the other country (usually in foreign one) markets are perfectly competitive and do not require any kind of competition policy, see: Kyle Bagwell and Robert Staiger, "Competition Policy and the WTO", First Draft: August 17, 2001

[25] Bagwell K. and Robert Staiger, Petros C. Mavroidis, "It's a Question of Market Access", *American Journal of International Law*, Vol. 96, 56 – 76, 2002

[26] Kyle Bagwell and Robert Staiger, "Competition Policy and the WTO", First Draft: August 17, 2001, P. 25

scale than it would have been the case given no commitments were achieved at all.

In this chapter the author provides a review of existing approaches to the economics of interaction among different policies.

1.2 Practical implications for policy coordination

The first approach toward the nature of international trade agreements, their consequences and significance for international policy coordination is drawn from the general economic analysis.

The final finding of Kyle Bagwell and Robert W. Staiger in "*Domestic Policies, National Sovereignty, and International Economic Institutions*"[27] claims that the main problem with the coordination of trade, competition and environmental policies[28] in the current trade system is the need to make existing legal framework more flexible.

According to them, all provisions necessary for attaining efficient international policy choices were introduced to the GATT from the very beginning. Those clauses are Article XXIII of the GATT, containing the Members' right to bring violation as well as "non-violation" complaints[29] to the DSB and Article XXVIII of the GATT, which contains special procedures for renegotiations of bound tariff concessions. Taken

[27] Bagwell, Kyle and Robert W. Staiger, "Domestic Policies, National Sovereignty, and International Economic Institutions," *Quarterly Journal of Economics*, May 2001, pp. 519-562

[28] Not only environmental, but any other policy, requiring some form of domestic regulation

[29] Actually, it also sets out procedures for "violation" complaints.

together these two provisions provide all necessary legal instruments for the process of international policy coordination, while the only choice that governments make are still tariff rates. In this setting, Member states obtain even more sovereignty, than it is usually thought of[30]. The theory presented by Bagwell and Staiger is overly general. It was originally supposed to find a rationale under the present WTO system, but does not consider specific ways that are used in practice to curtail market access. To elaborate on those practicalities, "market discipline" approach could be helpful.

The economic significance of international trade agreements can be assessed through its consequences: trade liberalization and "import discipline" brought with it. Within this view, trade and competition policies in their domestic and international contexts are seen as interchangeably close to each other. Olivier Cadot, Jean-Marie Grether and Jaime de Melo considered in "*Trade and Competition Policy: Where do we stand?*"[31], that "import-discipline" hypothesis is an economic ground of trade and competition policy interactions in non-strategic and strategic environments.

The hypothesis as such is quite straightforward and imply, that one of the key sources

[30] Bagwell, Kyle and Robert W. Staiger, "Domestic Policies, National Sovereignty, and International Economic Institutions," *Quarterly Journal of Economics*, May 2001, pp. 519-562

[31] Olivier Cadot, Jean-Marie Grether and Jaime de Melo in "Trade and Competition Policy: Where do we stand?", *Journal of World Trade*, March 2000.

of gains from international trade is that international competition constraints the ability of domestic producers to engage in anti-competitive practices, which would otherwise reduce welfare. However, Olivier Cadot and others found a series of caveats in reasoning concerning the empirical testing of import-discipline approach. The common idea behind various verifications is the notion that "the ratio of imports to domestic supply tends to be negatively correlated with the profitability of domestic sellers, especially when domestic concentration is high."[32]

There are two underlying assumptions in this model. Firstly, import penetration is thought as a reasonably good proxy for exposure to international competition. Secondly, the concentration of domestic producers is perceived as closely correlated with their market power in autarky, so that the profits of a concentrated industry are more vulnerable to foreign competition than those of an industry that is already competitive in autarky.

Here the first question arises: whether the rents of a non-competitive industry are more susceptible to shifting to the benefit of foreign suppliers and at the expense of domestic consumers and overall national welfare than profits of comparatively more

[32] Schamalensee, R. and R. Willing, eds., *Handbook of Industrial Organization* (Amsterdam, North-Holland: 1989)

competitive ones? Is it true that an economy, where the relative share of non-competitive industries is high, is more inclined to be a "victim" of strategic rent shifting of its trading partners?

Most of the empirical tests dealing with "import discipline" hypothesis contain the regression of the measure of profitability, such as price-cost margins, on import penetration and a number of other factors potentially contributing to industry's profitability. Typical regression equation looks as follows[33]:

PCM_{it} (average price-cost margin for an industry, industry (i), time period (t)) = f (the measure of concentration[34], import penetration ratio, capital-output ratio, industry dummy, time dummy, multiplicative form of concentration and import penetration ratio) (1)

The *multiplicative form of concentration and import penetration ratio* in (1) reflects that the effect of foreign competition on profitability should be higher when the concentration of domestic producers is significant, because high profits in a

[33] Roberts, M. and J. Taybout, "A Preview of the Country Studies" in Roberts, M. and J. Taybout eds., Industrial Evolution in Developing Countries, (Oxford University Press: 1996)

[34] HHI (Herfindahl-Hirschman Index), for example

concentrated industry are likely to show a higher degree of market power. The coefficient on this variable is expected to be negative. The capital-output ratio reflects that average price-cost margins incorporate remuneration on the capital invested in the industry as well, whence the more capital-intensive the industry the higher price-cost margin it has[35]. The results, however, should be interpreted with caution.

Here are caveats in this approach that were spelled out in Olivier Cadot, Jean-Marie Grether and Jaime de Melo's article. Firstly, profitability could be controlled by specific industry characteristics. *Different industries may be characterized by different levels of productive efficiency*. Thus more efficient industries may be better equipped to maintain profitability in the face of foreign competition. Some industries can stay competitive and avoid the erosion of their profits thanks to their ability to innovate and *compete in dimensions other than price.* In this case estimates of the relationship between profitability and import penetration are likely to incorporate those hidden effects and appear to be biased. Dummies on industry characteristics and on exogenous macroeconomic influences (changes in real exchange rates, interest rates, etc.) could be included if the panel data are available. That in fact means that if

[35] Olivier Cadot, Jean-Marie Grether and Jaime de Melo notice, that there is a voluminous literature on this issue and the evidence is overwhelmingly in support of the "import discipline" hypothesis, but the interpretations of those results could be mixed.

foreign firms that are perceived domestically to be efficient are unable to penetrate home market, it does not necessarily mean that local firms engage in anticompetitive behavior. This point has been completely missing in the position of US Trade Authorities.

At the end of 1980s, for example, the US Trade Representative observed that if a foreign market was not penetrable by efficient American firms, and if no sovereign restraint could be found, then the private restraint *must* exist. The US Assistant Attorney General for Antitrust added that if trade law could not pry open a closed foreign market, then US antitrust law could and would do the job.[36] "The emerging insight" about "synergy between trade and competition policy at the point of market access", however, blocked the international development of an alternative view, which stands on the assumption that locally groomed cultural peculiarities in business practices can make local businesses more efficient in local environment given that no actual collusion occurred. The *Japan-Film* case also showed that countries other than the United States were not ready completely to accept its radical view on the phenomenon and basic features of collusion, which was regarded as all private cooperation beyond the scope of traditional American business practices.

[36] Eleanor Fox, "Toward World Antitrust and Market Access", *American Journal of International Law 91* (1997), 10-12

The second argument is closely connected to the first one and deals with technology. When *firms' technological heterogeneity is taken into consideration, the other caveat of the model shows up. Presence of technological advantage can give rise to economies of scale.*

Generally, the more efficient the firm, the higher its margin is, the faster its growth and the larger its market share[37]. At the industry level it leads to a positive relationship between aggregate margins and concentration, which reflects heterogeneity rather than collusive behavior. This makes the results of price-cost margin regression on import penetration hard to interpret straightforwardly. In some cases even the plant performance data need to be available for clearer understanding[38]. The econometric technique, which is able to distinguish between technological and pro-competitive effects of trade liberalization involve the introduction of dummy variables for plants' market share and industry dummies. If plant's price-cost margin depends primarily on the plant's market share and industry coefficients are not significant, then the technology is an explanation. If mostly the industry dummies are significant, it is a

[37] Demsetz, H., "Industry Structure, Market Rivalry and Public Policy", *Journal of Law and Economics, 16, 1-10*

[38] Olivier Cadot, Jean-Marie Grether and Jaime de Melo in "Trade and Competition Policy: Where do we stand?", *Journal of World Trade,* March 2000.

sign that firms within the industry exercise market power[39].

Thirdly, there are also other limitations of the model. *The higher import penetration subsequent to trade liberalization does not necessarily mean that domestic firms prior to trade opening were engaged in anti-competitive behavior.* In accordance with Heckscher-Ohlin theorem, trade liberalization is likely to put a downward pressure on capital rate-of-return in capital-intensive import-competing industries, and it has nothing to do with anti-competitive practices as such. Thus the results of regression analysis of price-cost margins on import penetration in some of the industries[40] are inclined to be mixed, including *the effects of trade liberalization* that are not connected with antitrust concerns. *The type of trade that can bring competitive discipline is intra-industry trade. Whence, the formula cited above is likely to be more reliable for industries, where intra-industry trade is substantial.*

Also, in this analytical framework the price-cost margins are meant to reflect the extent of market power. It disregards, however, *the tendency of costs to increase at the*

[39] Olivier Cadot, Jean-Marie Grether and Jaime de Melo in "Trade and Competition Policy: Where do we stand?", *Journal of World Trade*, March 2000.

[40] Specifically, it is about industries, which procure most of their intermediate products and production factors at home. In those industries the "trade component" could substantially overweight the "discipline" factor in price-cost margins' reduction after trade liberalization.

absence of competition because of the slack management[41]. Taking into consideration this factor, it is quite possible that on the first stage of trade liberalization the increasing pressure on domestic firms would induce corporate restructuring and active cost cutting, leading to the lower costs at constant prices. But the extent of this managerial inefficiency fixing cannot be overwhelming in a market economy, since even in autarky economic profits would attract new entry, when there is no special regulation, and finally new entrants would drive the rents down, however not necessarily to the marginal cost.

Fourthly, the import penetration ratio could also be affected by the ability of domestic firms to deter foreign entry. This is a realm of antitrust law activity. Incumbent companies can use a number of "predatory" strategies to fend off foreign competitors or drive them out of the country.

Although it is not clear whether those predatory practices are viable and sustainable from the economic point of view, it is argued, for example, in the "long purse" model, that past profits can enable domestic producers to undercut foreign competitors' price even if it is not profitable for locals. The main justification for this kind of behavior

[41] So-called X-inefficiency

comprises the firms' anticipation of monopoly or collective market power conduct in the future.

The empirical results on predatory strategies are, however, mixed. The problem of endogenous variables impedes scholars from achieving a distinct effect of trade liberalization on the state of domestic competition. Competitive pressure is not necessarily reflected in international trade flows. When markets can be defined as sufficiently contestable, such that producers bear low sunk costs and the consumer switching costs are also low, domestic and foreign firms are engaged into the Bertrand-like price competition. In this case low import penetration means that domestic producers stay under significant pressure from foreign competitors and have to price their products at the world price level. When the transportation costs are high, incumbents can also use "limit pricing" technique to deter foreign entry.

In the conclusion it could be claimed that trade liberalization and a strict domestic competition policy may be viewed as close substitutes in their welfare effects, and this hypothesis was relatively solidly established in the empirical literature.[42] The question

[42] See also, Neven, D.J. and P. Seabright, "Trade Liberalization and the Coordination of Competition Policy" in L. Waverman W. Comanor and A. Goto (eds.), *Competition Policy in the Global Economy: Modalities for Cooperation*, (Routledge: 1997).

is whether the strict domestic competition policy may be viewed as superfluous, when international trade is substantially liberalized? Whether the "predatory pricing" is more viable in the export market or in the domestic market? Is it plausible to claim that instead of using expensive and unreliable predation within home market against imports, it is more efficient for import competing firms to mobilize the powers of the nation-state and prevent foreign competitors from coming on the domestic market?

There are three arguments, that domestic competition policy enforcement is not necessarily marginal, if the trade is liberalized. Any domestic economy suffers from ample heterogeneity. Some local industries are more competitive, especially those that are developed on abundant factors of production. Import competing industries that produce on scarce factors are likely to be in less advantageous position than their foreign competitors. Some of the sectors stay in autarky due to the government regulations or in case they are providing public goods.

Thus, firstly, imports cannot bring competitive discipline into the non-competitive sectors, especially in local closed service industries. Secondly, product differentiation and other aspects of non-price competition may protect domestic firms from foreign competition to some degree. Thirdly, if transportation and other additional costs of

delivering products or services from abroad are substantial, it may prevent the competitive pressure from coming even after complete trade liberalization occurs. Fourth, certain anti-competitive practices, such that vertical agreements between manufacturers and distributors, may have the effect of restricting market access granted throughout trade negotiations to the foreign producers.

Presumably, import-competing lobbies at home can seek protection from foreign competition by means other than trade policy: for example, by lobbying for looser competition laws allowing domestic firms to engage into concerted behavior that impair market access granted to foreign firms.

Even more difficult questions arise, when we consider the interaction between trade and competition policies in the strategic environment. As it was mentioned by Levinsohn in "*Competition Policy and International Trade Policy*"[43], whereas competition is aimed at curbing the market power of domestic producers, strategic trade policy is aimed to use their market power in order to shift rents away from foreigners. In this sense, *strategic trade and competition policies work in opposite directions*. Both the effects and motivations of those regimes should be clarified.

[43] Levinsohn in "Competition Policy and International Trade Policy", in J.N. Bhagwati and R. Hudec (eds.), Fair Trade and Harmonization: Prerequisites for Free Trade? (MIT Press, 1996).

As it was seen from the previous analysis, the liberalization of international trade itself, notwithstanding any additional qualifications, can serve as an effective tool of enhancing international as well as domestic competition. Despite the fact that incorporation of competition policy provisions into the WTO Agreements received a cautious attitude thus far, even the Uruguay Round Agreements show the tendency toward obligations prosecuting and sanctioning private parties' anti-competitive conduct. Present scope of the WTO encompasses domestic barriers and distortions that used to be out of trade policy reach.

1.3 Private Parties' Regulation under the WTO

Except for cases of dumping, state trading monopolies and companies enjoying exclusive or special privileges, GATT lacks rules explicitly regulating private parties' conduct. National Treatment provision provides foreign parties with the "guarantee" of non-discrimination on the domestic market. The requirement of publication and equal administration of trade regulations is designed specifically to implement transparency requirement. It should be admitted, however, and some disputes confirmed that[44], the Parties have no clear obligations in the field of competition policy execution with respect to the foreign firms. The only obligation is to provide "equal footing" for domestic and foreign companies within national markets under the National Treatment clause. There is also an inherent danger for the world trading system that arises from potentially active utilization of "non-violation" complaints, when nullification or impairment occurs. The complainant in this case cannot claim the respondent's measure at issue to be removed, but it can withdraw "substantially equivalent concessions" of its own in response. *Then, what is the difference between such kind withdrawal and retaliation?*

[44] *Fuji-Kodak* case or *Asbestos* case, for example

The provisions concerning private parties' behavior in the realm of international trade were already included into the Havana Charter. Chapter V of the Havana Charter deals with restrictive business practices that contracting parties ought to prevent and sanction.[45] They are defined in Article 46 as those "commercial practices of private parties affecting international trade, restricting competition, limiting market access or leading to monopolistic control, when those practices have negative effects on the expansion of production and trade, and interfere in the obtaining of any of the designated objectives." Article XXIX of GATT incorporated the Havana Charter in anticipation of GATT's expected merger into the ITO in the following provision and the failure of ITO does not affect the enforcement of this Article:

"The contracting parties (currently Members) undertake to observe to the fullest extent of their executive authority the general principles of chapters I to VI inclusive and of chapter IX of the Havana Charter, pending their acceptance of it in accordance with their constitutional procedures."[46] In accordance with the general treatment of the international public law, Chapter V of the Havana Charter is still the part of the

[45] Carmen Otero Garcia Castrillon, "Private Parties under the Present WTO (Bilateralist) Competition Regime", *Journal of World Trade* 35 (1): 99 – 122, 2001

[46] Ibid

GATT-94. In 1955 the GATT contracting parties agreed to eliminate the relationship with the Havana Charter with the proposal to derogate Article XXIX. The proposal was passed unanimously, but was never adopted because one contracting party did not ratify the modification.[47] In 1960, the Report of the Group of Experts on Restrictive Business Practices rejected a multilateral negotiation on restrictive business practices without considering the existence of the Havana Charter and Article XXIX of the GATT. On the contrary the Report proposed that the interested contracting Parties should hold consultations among themselves concerning the matters they were interested in. In 1984 in *the United States – Canada, on the Administration of the Foreign Investments Review Act*[48] the Panel raised the question about whether Article XXIX of the GATT is still viable. The result was inconclusive, and the fact that in the *notorious Fuji-Kodak* case the United States did not use Article XXIX shows its lack of significance in contemporary WTO jurisprudence.

The US strives to enforce some of the anti-competitive provisions in WTO dispute settlement on the one hand, and resists the adoption of the multilateral rules on competition policy on the other. This indicates that US authorities are not ready to limit their discretion in deciding which particular cases they want to invoke their right

[47] Report (L/327), adopted 28 February, (5 and 7 March 1955), BISD Supp. 3 at 240 (1955).

[48] (L/5504), adopted 7 February 1984, BISD Supp. 30 at 140 – 168 (1984)

to request the prosecution of anti-competitive conduct within the territories of its trading partners. US government is not inclined to be the subject of those requests from other WTO Members. Political considerations seem to outweigh the pure economic reasons thus far.

To sum up the theoretical foundations of international policy coordination, it should be mentioned that there is no clearly defined theory describing this process. Bagwell and Staiger tried to find a common place through connecting different domestic policies to trade policy, which is inherently international. The outcome came up to be supportive on the current framework of the world trading system, and critical on special “competition agenda”. As an externalities’ transmission tool was identified as relative world price. Since the relative world price is strictly a theoretical concept, the whole framework did not provide any practical avenues for policy development.

“Import discipline” hypothesis, on the other hand, suggested that competition policy in a liberalized economy is not superfluous. Figures 2.1, 2.2 and 3 illustrate the idea.

These preliminary findings are elaborated in the next section.

2. SHOULD WE USE ANTITRUST THEORY IN INTERNATIONAL TRADE PRACTICE?

2.1 An Alternative to Antitrust in International Trade – Institutional Approach

It is usually assumed that theory underlying national antitrust policies provide a sufficient analytical background for policy choices. Nevertheless, some scholars challenge this assumption asserting, that theory accepting imaginary "perfectly competitive markets" as a benchmark, has nothing to do with real economic environment. As it was contended by Ignacio de Leon in "*Should we Promote Antitrust in International Trade*"[49], "[the] kind of government regulation presents severe theoretical and empirical shortcomings which call into question its desirability as a policy to promote entrepreneurship and competition."[50] The links between trade and competition policies increasingly being examined under the WTO provide an additional impetus for closer scrutiny of competition policy theoretical background,

[49] Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

[50] Ibid

since its introduction into the international trade practice and dispute settlement is capable to overthrow traditional views.

In particular, some of the experts in the Working Group on Interaction between Trade and Competition Policies mentioned that "antitrust is unable to grasp, and therefore to regulate, the process of competition which it is supposed to encourage. As a consequence of this impossibility the policy does not promote trade. Instead it restricts it. These restrictions are even more significant in weak institutional settings, such as international trade."[51]

[51] Para. 20, document WT/MIN (96)/ DEC presented at the WTO's Ministerial Meeting held in Singapore in December 1996. See also, T. Eggertsson, The Economic Institutions, S. Schiavo-Campo (ed.), World Bank Discussion Papers 241, The World Bank, Washington, D.C., 1994, pp. 22). He claimed, in particular, that "Weak institutions are usually associated with a weak state. In some circumstances, various decentralized groups (trading companies, guilds) have taken over the role of the state and succeeded in providing stable property rights, but a system based entirely on decentralized property rights is unlikely to provide a foundation for modern industrial economy."

2.2 Market Structures and International Trade Regulation: The Shortcomings of Antitrust Theory

The discussion presented here is intended to review and analyze an alternative structural approach to competition supplied by the ideas developed within neo-classical economics. The main critique presented by R. Cordato and then upheld by Ignacio de Leon[52] claims that the basic concepts of contemporary antitrust theory are flawed, since they disregard uncertainty, while antitrust authorities' rulings apparently infringes on the material property rights. According to this view, the empirical literature allegedly suggests that there is no directly established link between the number of firms in the industry (or in the marketplace) and their inclination to collude, especially in the presence of unclearly defined property rights in the context of international trade. The following discussion starts with short historical reminiscences about trade and competition policy interactions in institutional approach settings, then presents the debates on *free trade – fair trade issue,* and concludes with the overall assessment of "institutional antitrust".

[52] Cordato, Roy E. (1992) *Welfare Economics and Externalities in an Open Ended Universe: A Modern Austrian Perspective*. Boston: Kluwer Academic Publishers Group; Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

The first antitrust issue in the context of international trade was about the *fairness* of international commerce. As an "unfair" conduct, that should be checked, the sale below certain price levels was particularly important, as it embodied the essence of domestic producers' incapability to compete with imports. Whether there is some economic meaning in this interpretation of economic fairness is doubtful, since it should be concerned primarily with the equality of opportunities, but this idea gave rise to the adoption of antidumping provisions within the body of American economic law and into the GATT Agreements as well. The incorporation of antidumping clauses into the GATT constituted the first step in understanding that trade and competition policies interact with each other, and they established the only rules dealing with private business conduct within international trade law.

Conventionally, dumping is defined as "exporting at prices below those charged on the domestic market (or, if none, on the third country market) or at prices insufficient to cover the cost of the goods sold."[53] Subsidies provided to lower the production costs of national producers are also deemed unfair and illegal and referred to as "any

[53] J. Jackson, W. Davey and A. Sykes, *Legal Problems of International Economic Relations*, West Publishing Co, St . Paul, Minn, 1995, pp. 671-672.

help paid to an industry on products that are exported."[54] For a long time there was no accepted explanation of dumping or subsidization, since it seemed against the rational firm behavior. "The proponents of the theory argued that selling at a loss would be profitable if monopolistic prices could be imposed once domestic rivals were displaced by dumped imports. Yet, the supporters of this theory could not explain how the new incumbents could impose such abusive prices without encouraging new competitors to come up."[55]

In the antitrust literature this problem was given attention under the rubric of "predatory pricing". Thanks to development of a structural view on markets, the technique of "predation" in domestic as well as in the international context received a certain degree of credibility. The interrelations between antidumping practices in international trade law and antitrust practices with respect to "predatory pricing" are investigated in the next subsection. The main interest of this subsection is to accentuate the significance of underlying assumptions, which allow the concept to exist.

[54] Ibid, p. 758

[55] Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

Structural analysis of markets suggests *that market concentration is regarded as essential to judge the degree of market competitiveness; the more concentrated the market, the less competitive it is likely to be*[56]. Ignacio de Leon even claims that "the structural understanding of markets turned into a true "paradigm" in the Kuhnian sense. Over time it became broadly shared at the international fora."[57] In the joint progress report of the Committee on Competition Law and Policy and the Trade Committee of OECD, it was specifically emphasized: "globalization should produce more efficient production and marketing, lower prices and improved product quality and variety, but *it will fail to do so unless market access and competition can be preserved and enhanced*."[58]

So *the primary link between trade and competition policies goes through the market access concept.* According to this view markets themselves can create obstacles for

[56] The summary of public interest theory of regulation is found in W. Mitchel and R. Simmons, *Beyond Politics: Markets, Welfare and the Failure of Bureaucracy*, Westview Press, Boulder, 1994, pp. 3-37; Jeffrey Church and Roger Ware, *Industrial Organization: Strategic Approach*, International Editions, 2000;

[57] Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998 and see, T. Kuhn, The Structure of Scientific Revolutions, The University of Chicago Press, Chicago, 1970

[58] OECD Working Papers, Trade and Competition Policies, No. 35, Paris, 1994

their own functioning, and the task of a ***competition authority*** is ***to distinguish between "fair" and "unfair" business practices***.[59]

The empirical evidence raised by the public choice school casts serious doubts upon the soundness of public policy delivered by the governments. This literature supplies abundant evidence on how governments, not the markets, fail to deliver public interest, which in the present case means the promotion of competition.

Thus, in *Beyond Politics: Markets, Welfare and the Failure of Bureaucracy* W. Mitchel and R. Simmons say, for instance, that the most prominent feature of regulation is the "capture" of a regulator by regulated industries. In more subtle variants of a "capture" theory it is argued that rents are spread among different competing groups and do not benefit only one constituency group, such as a producer. This might explain that antitrust is likely to be shaped by the combined private interest of less efficient competitors, government attorneys seeking fame and experience in the field, economists expecting high income from their professional

[59] W. Shughart, J. Silverman and R. Tollison, *Antitrust Enforcement and Foreign Competition*, in *The Causes and Consequences of Antitrust: The Public Choice Perspective*, F. McChesney and W. Shughart (eds.), The University of Chicago Press, Chicago, 1995

advice as court experts, bureaucracy, litigants and the like. Several empirical studies were presented on this issue.[60]

The important theoretical shortcomings of neo-classical perspective include the abstractness of the notion of "equilibrium", which was not properly emphasized in the literature. It is argued that "[the limitations of the neo-classical theory] have misguided policy makers for decades, making them prone to believe that it is possible to attain an "optimal" state of social efficiency, where resources would presumably be allocated according to their "highest" social value. They [limitations] have framed in the minds of policy-makers a whole "regulatory" paradigm, inviting "corrective government intervention to offset perceived "market failures". Given that determining the instances of such market failures normally conveys a degree of administrative discretion, the result of enforcing this paradigm is that property rights are constantly threatened by unwarranted government intervention. The aftermath of this process is that competition itself will be discouraged, as firms would not know for sure their access to social resources and the real extent of their entitlements."[61]

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[60] *The Causes and Consequences of Antitrust: The Public Choice Perspective*, F. McChesney and W. Shughart (eds.), The University of Chicago Press, Chicago, 1995; G. Stigler, "The Theory of Economic Regulation", *2 Bell Journal of Economics and Management Science*, 1971; S. Peltzman, "Toward a More General Theory of Regulation", *19 Journal of Law and Economics*, 1976: 211-240

[61] Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

Scientific analysis in antitrust investigations is grounded in the "models" representing the behavior of "market forces"[62]. These models, of course, cannot evaluate the whole complexity of the real world hence they have to be based on certain simplifications, or "assumptions". Usually, they compare consequently how the examined aspects of the reality would change, if assumptions were relaxed. The variables excluded from the model are regarded as "fixed" and as not influencing the outcome.

This kind of models represents the ideal visions of reality, not the reality as such. Government policies worked out in accordance with them would indispensably suffer from various distortions, since they do not touch upon real behavior of economic agents, but mainly reflect their perceived reactions expected in compliance with the predictions.

Here a more elaborate scrutiny of the concept of "equilibrium" is in place. An important caveat related to the notion of "equilibrium" is that under such a state,

[62] The critiques of neo-classical economics presented in various works, for example, in S. Cheung, *The Myth of Social Cost: A Critique of Welfare Economics and the Implications for Public Policy*, Institute of Economic Affairs, London, 1978.

social resources are allocated most efficiently among economic agents, according to their highest attached value.[63] The state of equilibrium is possible within the markets, which shows certain properties, for example, populated with agents possessing perfect information about present and future technical capabilities of the particular industry, complete knowledge about the strategies of rivals and consumer preferences. In this setting individual firms cannot manipulate market environment to their advantage.

The implicit idea of the competition policy is that the closer the structure of a real market to that "social optimum" state of perfect competition, the more likely it was that the competition would be brought about. All real markets are classified as "imperfect" and "monopolistic". Based on this theoretical background, the economists have developed a reasoning to explain how market concentration limits competition. However, the purpose of positive models is not to depict a reality, but to create a tool for its "preparation". As it was argued "policy-makers assumed that their actions should replicate, wherever possible, ideal market structures or at least, to approximate real markets to those optimal standards. In this way, they would encourage the optimal efficient allocation of social resources across the society."[64]

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[63] V. Pareto, Manual of Political Economy, Macmillan, London, 1970

[64] Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

In this setting, however, the policy-makers have ignored those assumptions and limitations that had been originally made while creating a model: *the dynamic competition has been disregarded*. The models of "pure monopoly", "monopolistic competition" and "oligopoly" would not commonly be more useful in regulating the reality, since they often assume complete information and simultaneous actions by market participants.

Recent developments in game theory provide certain tools that are able to alleviate given constraints. They are equipped to provide for incomplete information as well as sequential actions of market agents. However, the development of this body of literature is not sufficient to provide firm theoretical foundations for antitrust policy[65]. The critique of neo-classical approach to antitrust seems plausible in some respects. However, its proponents do not propose a clear alternative understanding of competition and competition policy. It was argued though that the focus of public policy should not be the comparison of real markets with ideal, yet unattainable, state

[65] See, for example, Anderson S. and M. Engers, "Stackelberg versus Cournot Oligopoly Equilibrium", *International Journal of Industrial Organization 10*: 127-135, 1992; H. Demsetz, "Barriers to Entry", *American Economic Review* 72: 47-57, 1982; A. Dixit, "The Role of Investment in Entry Deterrence", *Economic Journal* 90: 95 – 106, 1980; A. Dixit, "Recent Development in Oligopoly Theory", *American Economic Review, Papers and Proceedings 72*: 12 – 17. Paul R. Krugman, *Rethinking International Trade*, 2000: The MIT Press, Cambridge, Massachusetts, London, England

of affairs, but the comparison of rules and institutions which improve or worsen the conditions within which economic agents are encouraged to compete[66].

This approach has its background from the works of R. Cordato, who introduced a “welfare criterion” based upon the so called “Austrian economics”. The basis of Cordato's welfare criterion is the judgment that individuals should be able to pursue goals, even if they make errors. He writes, that "[the] task of the economist, when considering normative questions, is to identify those institutions that best facilitate [the process of trial and error]." "[The] overriding purpose...is to identify, generally speaking, the framework within which individuals, as social beings, are able to most efficiently [i.e., through the trial and error process] pursue their goals."[67]

Evidently, there is a certain problem with this approach. Although Cordato does not point this out, it is evident that an individual could totally fail to achieve any goals.

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[66] The need to understand institutional constraints within which the economic exchanges are performed was emphasized by the Austrian School of Economics. The exchange itself in this setting is of secondary importance. To this “institutional” perspective, it is irrelevant to judge “efficient” social outcomes resulting from market exchange. Instead, the observers should focus their attention upon the “efficiency” of the processes leading to such outcomes. Under this new understanding the term “institutional efficiency” is judged according to its capability to allow each individual to achieve his goals, in the most expedient way. See, R. Cordato, *Welfare Economics and Externalities in a Open Ended Universe: A Modern Austrian Perspective*, Kluwer Academic Publishers, Boston, 1992

[67] Cordato, Roy E. (1992) *Welfare Economics and Externalities in an Open Ended Universe: A Modern Austrian Perspective*. Boston: Kluwer Academic Publishers Group.

He may also prefer a system in which freedom to pursue goals may be limited in some way. Nevertheless, if institutions enabled him to pursue his goals through the trial and error process, the institutions would be judged as good. He labels his criterion for judging institutions "catallactic efficiency."[68] With this welfare criterion in mind, he goes on to describe two characteristics of what he calls the ideal institutional setting[69].

The first characteristic is *private property*. The second is *freedom to exchange*. Such a setting will "*best facilitate the use and discovery of information, the appropriateness and relevance of which can only be known by those who need to discover and use it.*" And it will "allow individuals to gather the necessary physical resources" to carry out their individual plans.”[70]

With respect to how such an ideal should be employed, Cordato refers to certain "institutional inefficiencies...that are generated by deviations from the 'ideal' legal framework."[71] He mentions that such inefficiencies "can arise because people are prevented in some way from fully utilizing their property or because rights to property are not clearly delineated." Cordato admits that the ideal institutional setting is

[68] Ibid: 65

[69] Ibid: 64 -68

[70] Ibid: 63

[71] Ibid: 69

difficult to fully specify. However, in light of his attack on an alternative framework, it would seem that he should provide at least some guidance on key issues.

The central concept of Cordato's writing is on the appropriate delineation of material property rights. Leaving the concept of property rights delineation a little bit unclear, what he apparently means is that existing *material* property titles imply, unless bargained away, a right to receive compensation for all decreases in value. However, a systematic ruling in favor of rights to material property would provide a premium on the ownership of such property and a corresponding penalty on the ownership of non-material factors of production. The importance of this point will become more evident in the discussion that follows.

"As opposed to Coasean analysis, where property rights are the most important variable, the Austrian school's approach to all externality related issues has consistently been that clearly delineated property titles and rights must be taken as given."[72] The discussion developed by Codato, insists on "strict liability" concept with respect to clearly delineated material property rights. It is supposed then that any "invasion" of those property rights should be compensated. However, as some

[72] Ibid: 102

Corado's[73] critics reasonably point out, the alleviation of uncertainty with respect to exploitation of material property rights possessed by their holders would be offset by the increased uncertainty for those, who have the rights of action, which are non-material. The probability that this newly constructed system would operate more efficiently is low.

As Patrick Gunning shows, the fundamental inconsistency with Corado's analysis is that he totally disregards the need to assign initial entitlements to non-material factors of production -- i.e., to rights to control actions. In the context of competition policy, this approach has produced the concept of "dynamic competition" as opposed to the traditional understanding of "structural competition."

It states that in the real world entrepreneurs are surrounded by the "fog of ignorance", which subjects him to make mere speculations about how the future will affect him. As G. B. Richardson has argued, entrepreneurs are always forced to seek more information to encourage the today to make investments related to the future production decisions, regardless of the fact the knowledge could never be complete

[73] For example, Gunning, J. Patrick, "Austrian Welfare Economics? A Misesian Response", (manuscript), and "The Liberal Economist's Dilemma: Rothbard's Critique of Mises's Value-Free Economics." (manuscript)

and uncertainty will reappear.[74]

According to the "Austrian School", entrepreneurship is the process of constant "trials and errors". Businessmen seek to reduce the waste resulting from mistakes made under this "trial-and-error" process in ways, which allow them to hold on their initial expectations as to how the future will really unfold.

In *Welfare Economics and Externalities in an Open Ended Universe: A Modern Austrian Perspective*[75], R. Cordato distinguishes between the future facts driven by natural events and those resulted from certain human actions. The first set of disturbances may be alleviated by insurance, since it is possible to assign (in Cordato's view) the actuarial probabilities to them.

The second class of events is not eligible for this procedure: human actions cannot be subjected to any kind of regularities and predictions, as human beings constantly rearrange and redefine their behavior according to ever-changing information, which

[74] G. B. Richardson, *Information and Investment*, Oxford University Press, London, 1960, cited from Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

[75] Cordato, Roy E. (1992) *Welfare Economics and Externalities in an Open Ended Universe: A Modern Austrian Perspective*. Boston: Kluwer Academic Publishers Group.

in turn makes them to reconsider their goals and objectives[76].

To make reasonable decisions, entrepreneurs are forced to build up mutual expectations, provide reassurances about their future actions. They could rely on their past trading experience, judge their trading partners in compliance with their reputation, or they use different kinds of contracts in order to alleviate uncertainty associated with incompleteness of information about the future.

In most cases contracts are not available though. Parties to exchanges try to align their conduct to that of the rest of entrepreneurs in the industry, on the basis of what they expect from them. Obviously, all these techniques limit the possibilities for entrepreneurs to choose “independent paths”, but those constraints arise not as a result of attempts to monopolize the market, but rather out of desire to mollify the uncertainty in business environment, to avoid the losses and forecasting mistakes.

Richardson makes a distinction between business transactions that are *competitive* and

[76] This feature of human actions was incorporated into the “traditional” analysis of competition before the “structural and game theoretic approaches reaped the priority, see, I. Kirzner, *Competition and Entrepreneurship*, University of Chicago Press, Chicago, 1973

those, which are *complementary.*[77] In case of competitive activities, the increase in the level of investment made by one firm negatively affects the rest, as the resulting increase in that firm's future output is likely to reduce the others' possibilities of boosting their own production. In case of complementary investments, a similar uncertainty may arise. Here, the investments made by one firm that encourage the producers of complementary products to magnify their investments would generate the spillover cycle of mutually advantageous production only if the former firm is capable to make credible commitments. Is it possible to ensure that?

As Ignacio de Leon argues, there is only one possible answer to this question: the firms limit their independence of action in order to uphold the expectations of their trading partners as well as their competitors. He also writes that entrepreneurs have no real choice in deciding whether they should align their own conduct with the conduct of the rest, since this is the only possibility to make the right decision about their investments. This conclusion by no means implies that rivalry ("dynamic competition") is excluded, as in the end the future is unknown, and the inevitable

[77] G. B. Richardson, *Information and Investment*, Oxford University Press, London, 1960, cited from Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

emergence of unseen new opportunities would create gaps in knowledge and technology, upon which the more active businessmen would win.

This logic suggests that parallel conduct, for instance, provide business environment with certain degree of definiteness necessary for decision-making, but it does not imply that every firm should abide by the "rules", if circumstances change or if new opportunities arise[78]. Within this framework the similar flaw applies to the rest of "anti-competitive conduct" as well.

From the view of "structural approach", however, antitrust theory considers this kind of performance as a "concerted behavior" aimed at abuse the dominant position. As indicated, institutional approach presuppose that within dynamic notion of competition, *competition does not relate at all to market structure (the number of firms), which is regarded as a mere accident of reality with no further consequences.*

"Dynamic competition relates to the possibility, prospective into the future, that a given entrepreneur will exercise his or her alertness to seize a new opportunity

[78] Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

hitherto unforeseen by the rest of the business community."[79] This activity has to be related to the new sector, new product, technique or geographical area. In this case the number of market participants is irrelevant. Indeed, under this dynamic paradigm, it is impossible to define market structure with relevance to some products or geographical areas. Therefore, what is important in this setting is that the *entrepreneur would not be prevented from exercising his or her alertness by the institutional means: laws, regulations, social customs and so on*. This approach requires a different approach to the competition policy. As Rothbard argues "there are no "monopolistic" prices, but only free market prices."[80] The flawed nature of the standard of "social efficiency" ("perfect competition") leaves a lot of space for administrative discretion, which actually infringes, in the opinion of Austrian school scholars, on private property rights of economic agents.

This "institutional" approach to the competition policy implies a different avenue toward the interaction between trade and competition policies. Regulating "structural" competition (i.e. counting the number of firms in the market) does not necessarily enhance rivalry and entrepreneurship, as antitrust supporters do assume.

[79] Idid: 51

[80] M. Rothbard, Monopoly and Competition, in Man, Economy and the State: A Treatise on Economic Principles, Vol. II, D. Van Nostrand Company, Inc., New Jersey, 1962

Based on the Prisoner's dilemma situation developed under the game theory[81], it is possible to predict that governments will be inclined to favor their national firms against their foreign counterparts. Yet, the existence of multilateral commitments prevents them from making such distinctions and from disguise discrimination against foreign firms. They could do that only at the presence of regulatory loopholes enabling them to decide according to discretion. Therefore, government discretion should be kept to a minimum and any institution developed to promote trade transactions and business competition should be designed in accordance with this goal.

In this context, the importance of assignment of property rights should be emphasized. Firstly, there should be a proper delineation in the sphere of individual rights, which encompasses not only initial delimitation of rights over things (as it comes from the Cordato's view), but also the clear rules over transmission of this rights.[82] Secondly, it calls for expedite and efficient dispute settlement mechanism allowing the elimination of any source of interference and uncertainty in the initial allocation or transfer of rights. An efficient dispute settlement system would allow the solution of ex-post conflicts over the use of resources due to a poor ex-ante identification and

[81]Approach developed by Bagwell and Staiger was discussed in the previous section, See also A. Dixit and B. J. Nabeluff, *Thinking Strategically*, W. W. Norton & Company, New York, 1991

[82] Within this framework the rights of action are still disregarded as it was mentioned in Patrick Gunning's critique

assignment of rights.

Therefore, there are two ways in which government intervention is necessary for market functioning and competition. First, there is an ***ex-ante definition of entitlements and individual spheres of action*** and, second, the ex-post intervention aimed at clarifying, albeit in an imperfect way, the contents of this sphere of action in cases where the initial entitlements are not obvious enough. *The ultimate goal of defining the rights and entitlements lies in the public interest to prevent unauthorized subjects ("free riders") from obtaining undeserved benefits out of the investments made by the legitimate owners.*

According to this view, WTO system should have been developing based on a different set of priorities. Presently, the most important part of the WTO Agreements is concerned with antidumping, subsidies and safeguards, aiming at protecting national production base at the face of increased foreign competition. Following dynamic competition paradigm, Member countries should have been focusing mostly on the harmonization of privatization rules and on making them mutually recognizable; on the agreements on state owned enterprises and government procurement; intellectual property rights and international investments rules. All these

topics (with the exclusion of privatization, which is regarded out of the scope of the trade agreements) are now under intensive scrutiny of the various WTO committees, but they are not reckoned as a foundation, but rather as complementary agreements. Present focus on agricultural subsidies and development agenda is overwhelming.

These elements can also provide the tips of how to reform the competition policy in international trade. It should provide economic freedom to market participants in order to provide them with *effective market access*[83], which is frequently denied to satisfy the interest of different interest groups. This sort of intervention, in Leon's view, will definitely reap the positive results in terms of competition's promotion in more effective way than "chasing elusive monopolistic practices."[84]

In sum, the goal of the alternative competition policy in the international trade is to enhance the predictability of market participants through reduction of uncertainty over their individual rights. If there is an International Economic Order[85], fundamentally integrated by the WTO system, in case the economic rights (understood in terms of

[83] With respect to the centrality of the notion of "market access", institutional approach is not much different from that of "structural" avenue.

[84] Ignacio de Leon, "Should We Promote Antitrust in International Trade", *World Competition*, December, 1998

[85] The suggestion made by Petersman, E.U. Petersman, Constitutional Functions and Constitutional Problems of International Economic Law, Pupil 3, University Press, Fribourg, Switzerland, 1991

initial entitlements) of the participants are infringed by the trade protectionism, they should be protected through the WTO dispute settlement. In fact, this road leads to the WTO functioning as a body not only for governments, but for private parties as well.

2.3 The Interaction between Trade and Competition Policies in Neoclassical Settings

Already in an early paper of Auquier and Caves[86] the tradeoffs between consumer welfare and monopoly profits of a corporation from abroad were discussed. Dixit in "*International Trade Policy for Oligopolistic Industries*"[87] made the first overview of the literature in the area. In particular, he investigates how domestic welfare, in an oligopolistic model of international trade, *depends on the number of home firms, the number of foreign firms, and export subsidies.* Dixit was the first who raised a well known argument of ***interchangeability of import tariffs and lax domestic competition***

[86] Auquier, A. and Richard Caves, "Monopolistic Export Industries, Trade Taxes, and Optimal Competition Policy", *The Economic Journal*, Vol. 89, 1979, pp. 559 - 581

[87] Dixit, Avinash, "International Trade Policy for Oligopolistic Industries", *Economic Journal*, Supplemental Issue, 1984, pp. 1 - 16

policies. He wrote: "the commonly expressed view that the existence of foreign competition makes domestic antitrust policy unnecessary, and may even make it desirable to encourage mergers of domestic firms, or prevention of the excessive entry, so as to keep the home industry strong enough to withstand foreign competition."[88] From the very beginning of the literature on international mergers and imperfectly competitive international markets, there was an understanding that trade and merger policies may interact.[89]

But actually very few papers addressed this interaction directly with the most notable exclusion of Kyle Bagwell and Robert Staiger works. The rapidly expanding literature on the interaction of trade and competition policies is focused mainly on merger policy analysis in the presence of international competition. Other aspects such as vertical restraints, antidumping regulation and international price fixing and their implications for the conditions of market access are still underdeveloped from the theoretical point of view.

The new "open economy industrial organization" typically analyses how domestic

[88] Ibid

[89] Ordover, Janusz and Robert Willig, "Perspectives on Mergers and World Competition", in Grieson, Ronald E., (ed.), *Antitrust Regulation*, Lexington, Mass., and Toronto: Health, Lexington Books, 1986, pp. 201 – 18

merger policy change when the domestic country trades with other countries. Trade policy as such in those papers is at the very background or simply absent.[90] Another significant paper is that of Bliss[91], in which the author argues against the harmonization of competition policies across countries.

There is also a related literature in international regulation, which investigates the issue of delegation of regulatory powers from national authorities to an international body. Bhagawati[92], Gatsios and Seabright[93], Neven[94] also raised this question. The main outcome of this discussion is the identification of policy spillovers or externalities.[95]

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[90] The examples of those paper s are Barros, Pedro and Luis Cabral, "Merger Policy in Open Economies", *European Economic Review*, 38, 1994, pp. 1041 – 1055; Head, Keith and John Ries, "International Mergers and Welfare Under Decentralized Competition Policy", Faculty of Commerce, University of British Columbia, Mimeo, 1995; Levinsohn, James, "Competition Policy and International Trade Policy", *Fair Trade and Harmonization*, J. Bhagwati and R. Hudec (eds.), MIT Press, 1996, pp. 329 - 256

[91] Bliss, Christopher, "Trade and Competition Control", *Fair Trade and Harmonization*, J. Bhagwati and R. Hudec (eds.), MIT Press, 1996, pp. 313 - 328

[92] Bhagwati, Jagwish, "Fair Trade, Reciprocity and Harmonization: the Novel Challenge to the theory and policy of free trade", Paper presented at the Conference on Analytical and Negotiating Issues in the Global Trading System, University of Michigan, Ahn Arbor, 1991

[93] Gatsios, Konstantine and Paul Seabright, "Regulation in the European Community", *Oxford Review of Economic Policy*, Vol. 5 (2), 1990, pp. 37 - 60

[94] Neven, Damien J., "Regulatory Reform in the European Community", *American Economic Review*, vol. 82 (2), 1992, pp. 98 - 103

[95] The term "policy spillover" was used by Henrik Horn and James Levinsohn in "Merger Policies and Trade Liberalization", *NBER, Working Paper 6077*, June 1997, while the term "externality" is employed in later works of Kyle Bagwell and Robert Staiger. Their meaning is similar and concerns

The fact that the majority of already existing free trade agreements (FTA) and customs unions (CU) recognize the need in competition and trade policy coordination is a reflection of those perspectives obtained trough thorough investigation of their interchangeable as well as conflicting interests and goals. Competition and trade policies sometimes interact so closely that the very distinction between them becomes something of the least importance in terms of their economic meaning. For example, as it was mentioned in *the Report of the Working Group on the Interaction between trade and competition policies to the General Council (1998)*, "antidumping may arguably be necessary to reduce distortions in international trade. But on the way of a single market being developed, bilateral trade of the signatories becomes more typical of domestic rather than international trade, and hence the retention of antidumping provisions in this context becomes anomalous. In any case, the accomplishment of free trade between two countries, by facilitating arbitrage, substantially reduced the incentives for and the ability of exporters to dump".[96] It should be added, however, that the problem is surely not confined to the retention of certain trade remedies in the arsenal of nation-states.

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with the external effects of unilateral policy choices that creates a Prisoners' Dilemma situation within the multilateral talks' framework.

[96] WT/WGTCP/2, Page 23

On the way of growing economic interdependence, classical means of national trade policy are argued to become “outdated”, while approaches, traditionally perceived as instruments of domestic regulation and enforcement, are developing into the most appropriate tools for dealing on international arena. The conflict between economic efficiency and national sovereignty is unlikely to be resolved, and the growing number of regional trade agreements is an indirect indication of this phenomenon.

Generally, competition policy is understood as a body of national antirust laws and other regulations aimed at achieving an overall efficiency of national industries as well as often a degree of economic fairness and equality of opportunities. National competition policies can differ in their specific emphasis on each of those goals hence the worldwide coordination is hardly possible in the near future. The fundamental problem with this global harmonization arises when a simple question is asked: whether the attainment of global efficiency and fairness is possible at all? And if not, what kind of role the harmonized global competition policy is supposed to play? And how should it influence the trade policy concerns?

In sum, there are opposing views within the antitrust theory itself on what should be

regarded as an optimal and efficiency-enhancing competition policy in the open economy. Neoclassical economics suggest that competition and trade policies are interchangeable, and there is no need for competition policy coordination among trading partners. Cordato economics, on the contrary, establish the notion of dynamic competition as opposed to theoretically rather than practically defined “structural competition” and provide the alternative way for incorporating competition into the world trading system – through mutually accepted investment rules, primacy of intellectual property rights and remuneration on invested capital in order to prevent free-riding.

Historically, current world trading system has already incorporated “structural approach” to competition. This is clearly seen in antidumping, anti-subsidies, safeguards and many other provisions that are concerned with the threat of foreign monopolization of the domestic market. Relatively underdeveloped area of interactions between trade and investments and other property rights concerns shows that the dynamic competition approach is beginning to arise as a viable alternative, but reshaping the existing trade system within new paradigm might be too costly, if even possible. Figures 1, 2, 2.1, 2.2, 3 provide a graphic interpretation of the point.

3. TRADE THEORY PERSPECTIVES

3.1 The balance of concessions, "benefits accruing", reciprocity, non-discrimination

In general different "trade perspectives" show that basic pillars of current world trading system were formed under the strong influence of "structural competition" approach, which makes competition policy concerns secondary with respect to trade policy and promotes interventionists attitudes toward antitrust regulation.

Non-Discrimination

Article I of the GATT prohibits discrimination among trading partners with respect to tariffs and other border charges as well as certain domestic taxes. There are two important exceptions: the authority in Article XXIV for the creation of preferential arrangements and Special & Differential Treatment (Enabling Clauses during the Tokyo Round)[97].

[97] The following discussion is based on *Economic Dimensions of International Law*: Comparative and empirical perspectives, J. Bhandari, Alan O. Sykes, 1997; *International Trade: Theory and Evidence*, J. Markusen, J. Melvin and others (eds.), 1995; *International trade*, MiaMikic, 1998

What is the incentive to discriminate on the part of a particular importing nation in Nash equilibrium (taking the policies of other nations as fixed)?

Discrimination to raise tariff revenues

A “small” country that acts as a price taker in the international marketplace faces a perfectly elastic supply of imports from all sources at the world price. Any attempt to discriminate against any of the suppliers will cause them to sell elsewhere, since the domestic market of the “small” country is not large enough to cause any sufficient injury to those suppliers. If the goal is to raise revenue, then for a small country this kind of policy is pointless.

For “large countries”, however, defined as nations that face an upward sloping import curve, the opportunity to exploit market power exists. In this case we can consider the country acting as a monopsonic nation. The “optimal tariff” will maximize national welfare taking into consideration other variables, such that the exchange rate and trade on other markets.

Under the competitive supply conditions and taking a partial equilibrium view, the

ideal form of price discrimination for a government maximizing national welfare, will be to impose a distinct tariff for each unit of each imported good equal to the difference between its supply price (given its location on import supply curve) and the competitive market price. Such a policy would extract the whole producer surplus.

The similar policy could be pursued by a nation, who is providing a protection for domestic industry. The importing nation would simply charge a tariff equal to the difference between the desired local price and the supply price for every unit of imports. Such policy would discriminate even not among countries but among producers. The discrimination can raise tax revenues. In general, the optimal system of discriminatory tariffs will tend to impose a greater one on exporting nations with a less elastic export supply curve, since producers in those nations will absorb more of the tariff through reduced prices than producers elsewhere.

However, large countries would not be tempted (if permitted) to use discriminatory tariff policies as often as could be expected. Those policies will induce entry and exit responses over time and encourage entry by high-cost producers subject to low tariff and exit by more efficient producers, which are under the high tariffs. Therefore, in the long run this policy can reduce revenue. If a government of a country possesses knowledge about how to affect entry and exit over time trough varying in time tariff

policies, such a policy can hardly be implemented since it requires extraordinary amount of information and enormous implementation costs. One more factor is to determine the country of origin of the good. In the era of multinational production it is not clear how to implement those efficient discriminatory policies.

Discrimination in cooperative agreement at the absence of transaction costs

When nations are trying to act in a cooperative manner the situation is not so simple. Tariff discrimination in a multilateral setting can cause trade diversion (the higher-cost producers can out-compete lower-cost ones thanks to the lower tariff rates), which results in deadweight losses. If all the trade partners are treated equally such deadweight losses do not occur, and this, other things being equal, enhances global welfare. On the other hand, it also can happen that a discriminatory reduction in tariffs can be more welfare improving than a policy of the maintenance of generally higher tariffs. The reason is that any tariff reduction would displace less efficient domestic producers with more efficient foreign ones (trade creation).

However, the general welfare perspective presented above is not exhaustive. To provide a more comprehensive answer the introduction of political factors is necessary. Discrimination favors some producers and makes worse off others. To

exert any influence a producer group should also be well organized. Not all the groups can achieve it.

Moreover, it appears that, if count all producer surpluses and government revenues as equally important discrimination is not always politically attractive. At any level of protection in an importing nation and under competitive conditions, a non-discriminatory tariff will maximize the sum of foreign producer surplus and the revenue of the importing government. *It happens due to the absence of deadweight loss*.

Lastly, nations creating an FTA or a Customs Union should make up their trade policies in such a manner to prevent the diversion of trade with non-member countries. The liberalization within the FTA or CU can be welfare enhancing but generally only if both countries had been administering prohibitive tariffs before the CU was organized. If at least one nation conducted trade with the non-member countries, the whole agreement may appear as trade divertive. It will finally reduce the sum of producer surplus and government revenues that could be achieved if tariff reduction were applied in a non-discriminatory manner. Thus, “permitted” under the GATT and WTO tariff discrimination is also not always helpful.

The problem with the above conclusions is that not all producer surpluses created are equal. It is well recognized that consumer surplus is less valuable politically as producer surplus. The same can be said about different producer surpluses as well. For example, integrated steel giants in US have been chronically experiencing the pressure from low prices on plate hot-rolled steel. The main constraint of the steel industry is that the production requires a lot of sunk investments in equipment and if sunk costs cannot be recouped the industry would be considerably better off with protection, other things being equal, than any other industry. Price increase resulted from protection is not likely to induce additional entry because of the high barriers to entry. Those producers have more compelling incentive to invest in trade protection than others.

The same could be observed on the export side. An exporter will benefit more from the concession that allows him to recoup its sunk costs, than from the other concession that will produce a short period of supra competitive profits, but will be eroded very fast by the successive entry. The same logic applies when an exporter is suffering from the protectionist measures abroad. If the measure simply erodes his excessive profits it is less injurious than when an exporter is deprived from the

opportunity to recoup its sunk costs. In the latter case the exporting industry will most probably lobby its government for retaliation.

There is an interest of workers as well. The workers in declining industries, who represent a kind of “specific factor” that could not be easily shifted to other industries, will behave analogously as firms with sunk costs. It is likely that workers in expanding industries will lobby less than those in declining ones.

All those political factors have much to do with the long run tariff policies, but it is clear that if some nations adopt discriminatory trade policy, within an FTA, for instance, they would liberalize the whole body of trade between themselves, thus tending to injure the declining industries and benefit expanding sectors, which are already competitive in the world market. Hence representatives of declining industries would more likely to oppose this preferential arrangement. An exceptional case may exist when an FTA or CU are in fact trade divertive, making declining industries comparatively better off by providing a chance to out-compete more efficient producers from non-member countries.

Multilateral bargaining process with the presence of transaction costs

MFN obligation may affect the transaction costs of the negotiations as well as the opportunities for strategic behavior in bargaining. In general, MFN helps to resolve one problem (protecting the value of concessions from future erosion), while exacerbating the other – free-riding.

The problem of free-riding emerges, when several countries are interested in obtaining a trade concession from the same trade partner[98]. In this case everybody of them is inclined to underestimate his readiness to provide reciprocal trade concession in the hope that other interested parties will be more willing to pay. With this understanding in mind it is highly probable that a deal will not be struck.

There exist alternative ways, but none of them is satisfactory. All parties interested in a deal can coordinate their offers in advance and put forward a collective offer. This procedure, however, could also be flawed with free-riding. Or the nations can abandon product-by-product procedure in favor of tariff cuts under the mutually accepted formula. Unfortunately, at the same time the nations are loosing the

[98] - WTO, Tariff Negotiations and Renegotiations under the GATT and the WTO

opportunity to reach politically optimal concessions and anyway have an incentive to deviate. Since it is impossible to eradicate totally a free-rider problem, there is no doubt that MFN prevents the parties from exhausting all possible political gains. Moreover, in a static setting of trade negotiation problem with the application of game theoretic approach it appears that, generally, tariff rates achieved with the application of MFN principle will be higher than those attained on a discriminatory basis (3T/2 and T/2, where T is a non-cooperative Nash equilibrium, when a tariff is set unilaterally). In a dynamic setting the outcome is more favorable for the application of MFN, since in a discriminatory case a nation offering a concession will try to find a point, where its partners are indifferent between negotiating and abstaining from bargaining (only the costs of bargaining accrue to them). But in this situation trading partners of an offering nation would not be interested in negotiations very much, running the risk that concessions will not be granted and the whole trade system could be endangered. On the contrary, the application of MFN in dynamic setting provides all partners with more sufficient gains.

There is one more possible solution to prevent free-riding. The pinpointing of a “like products” is really important in this case. It is not surprising that signatories to WTO and GATT have been trying to determine those like products, since it is directly

connected with the application of the MFN principle. On the one hand, the unduly narrow concept of the like product can totally eradicate the whole concept of MFN principle and all joint gains from avoiding trade diversion would be lost, on the other hand the unduly broad definition of a like product can exaggerate the free-rider problem immensely.

Generally in a cooperative setting the MFN obligation has its advantages and disadvantages. The benefits are referred to the protection of the concessions that was made during the previous rounds of negotiations or with the different trading partners and to the increased joint political surplus. The costs are incurred through the free-rider problem and through the limiting the plethora of opportunities to discriminate in circumstances, when it is actually more efficient (for example, in raising tariff revenue or when it might be valuable to benefit some politically powerful interest groups, such as declining industries). Additionally, the elimination of MFN principle from trade negotiations could impose additional costs due to the emergence of trade diversion.

Reciprocity

According to Kyle Bagwell and Robert W. Staiger[99], there are two basic implications of *reciprocity* concept for GATT/WTO practice. Firstly, in the course of trade negotiations, the governments normally seek a "balance of concessions" (tariff cuts)[100]. It is also mentioned that this insistence on reciprocity stands in a sharp contrast with the widely accepted reasoning, that unilateral free trade could be a best policy for a price-taking country (usually a small country). The seemingly irrelevant government policies could simply be explained by the cost-shifting influence of world-price[101] movements, associated with their unilateral tariff choices. The only chance for the member-governments to achieve tariff reductions includes the establishment of a setting, which prevents the world price ratio from moving and alleviate trade-associated Prisoners' dilemma. Although the reciprocity concept is broadly accepted by the Member governments, there is no such an obligation on reciprocity in the GATT.

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[99] Kym Anderson, "Peculiarities of Retaliation in WTO dispute settlement", *World Trade Review (2002)*, 1: 2, 123-134

[100] Bagwell, Kyle and Robert W. Staiger, "An Economic Theory of GATT," *American Economic Review*, XCIX, March 1999, pp. 215-248.

[101] World untaxed relative price presented by Bagwell, Kyle and Robert W. Staiger as $p=p^*_x/p_{y,}$ where p^*_x is export price of foreign producers of a good x and p_y is export price of a good y exported by domestic producers. Both prices are untaxed and represent world-price ratio. Interestingly, in this setting world-price is determined on the basis of standard two-countries, two-goods model, which imply that in practice those two "reciprocal" goods should be determined, and only in this case the whole framework will work. It is actually unclear, what if the setting of reciprocity will include more goods, say one on the one side and two on the other, which in sum makes for a "balance of concessions".

The second meaning of reciprocity concept is closely connected with *renegotiation* procedures within the WTO framework. All trading partners affected by withdrawal or change in previously agreed concessions are allowed to withdraw *substantially equivalent concessions* of their own.

Having in place this both-direction mechanism presumably should help to enhance the probability of achieving politically efficient outcome, which would not be subject for renegotiation induced by one of the trading partners in the future. However, whether it is really the case in practice is yet to be seen, since the present analytical framework disregards *the costs of renegotiation*, which could be substantially higher than the benefits from renegotiation. Instead other policy options for concession withdrawal may apply, such as unilateral policy choices in the areas other than trade policy.

Probably, governments often avoid legal procedures under the WTO directly because of this procedural inefficiency and time consuming nature, rather than because of their inclination toward "predatory" behavior.

One more indispensable principle of trade negotiations is non-discrimination. It is

embodied in the GATT/WTO rules through Articles I (MFN) and III (National Treatment), as well as in some other complementary provisions of other WTO Agreements. Bagwell and Staiger actually show [102] that in proceeding to the multilateral setting the concept of non-discrimination is inseparable from attaining efficient outcome. MFN and national treatment clauses are designed to prevent the nullification and impairment of previously achieved concessions with other trading partners, and therefore should *protect the whole framework from the systematic and endless renegotiation*. "The complementary relationship between the principles of reciprocity and non-discrimination in generating efficient outcomes rests upon a simple intuition. The principle of reciprocity has the effect of neutralizing the world-price effects of a government decision to raise tariffs, and so it can eliminate the externality that causes governments to make inefficient trade policy decisions provided that trade policy externality travels only through world prices."[103]

There are, however, some practical difficulties associated with the application of theoretical approach developed in the works on the economic implications of trade agreements, since trade theory usually uses very broad concepts in its explanations of

[102] Bagwell, Kyle and Robert W. Staiger, "An Economic Theory of GATT," *American Economic Review*, XCIX, March 1999, pp. 215-248.

[103] Ibid

governments' behavior, which stay far from the concerns of actual policy-makers. In "GATT-Think" piece Bagwell and Staiger introduce some explanations to this phenomenon[104].

According to their analysis, there are nowadays three basic approaches to understanding of agreed framework for international trade policy coordination. The appropriate question asked here is what is the purpose of a trade agreement? Why governments need to establish it? One motivation was already mentioned: the governments need to constrain the terms-of-trade externality to achieve Pareto-improvement in their countries' economic conditions. The explanations however are different a bit depending on which theory is applied.

[104] Bagwell, Kyle and Robert W. Staiger, "GATT-Think", NBER Working Paper Series, WP 8005, November 2000

3.2 The Purpose of Trade Agreements [105]

Traditional Economic Approach

This approach is comparatively old and well established. It was first clearly formalized in the works of Torrens (1844) and Mill (1844). Then it was developed further in a paper of Harry G. Johnson "Optimum Tariffs and Retaliation"[106], where he first formalizes the terms-of-trade driven inefficiencies, using two hypotheses: *governments can manipulate terms of trade and they seek to maximize domestic welfare*. The main findings of this literature show that the non-cooperative Nash equilibrium outcome of trade policy setting is indeed inefficient, since at this point the home and foreign iso-welfare contours are not tangent.[107] Hence, as Johnson stresses, while neither country can improve its lot with unilateral deliberation of tariffs, each country can in principle be better off under the trade agreement, which provide some mechanism for alleviation of terms-of-trade related Prisoners' Dilemma.

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[105] The following discussion draws heavily on Bagwell, Kyle and Robert W. Staiger, "GATT-Think", NBER Working Paper Series, WP 8005, November 2000

[106] Johnson, Harry G. (1953-54), "Optimum Tariffs and Retaliation," Review of Economic Studies, 1.2, p.142-53.

[107] Formal derivation of this outcome is provided in Bagwell, Kyle and Robert W. Staiger, "GATT-Think", NBER Working Paper Series, WP 8005, November 2000.

The work of Mayer[108] proved that the efficient tariff pairs in this framework satisfy the following relationship: $\tau = 1/\tau^*$, where τ is a tariff rate of a home country, while τ^* is a tariff rate of a foreign country[109]. These tariff pairs equalize local prices across countries and therefore achieve efficient worldwide outcome. The reciprocal free trade is among the efficient solutions, but it is not the only one. There is a set of efficient solutions, in which *one country is taxing and the other is subsidizing imports*.

Bagwell and Staiger also stressed that the appealing feature of this model is clarity of international trade agreement's potential role: it provides a framework to escape from Prisoner's Dilemma. According to traditional economic approach, the only reason for governments to pursue unilateral policies leading to the Nash outcome is their ability to manipulate terms-of-trade, leading to the "zero-sum" game among governments. Trade agreement must guide the governments back to the 'contract curve" solution, which represents in this case reciprocal free trade (as generally import subsidization rarely occurs). The explanation proposed by this approach is very unequivocal, but many economists repeatedly stress the unrealistic nature of underlying assumption of

[108] Mayer, Wolfgang (1981), "Theoretical Considerations on Negotiated Tariff Adjustments," Oxford E conomic Papers, 33, 135-53, cited from Bagwell, Kyle and Robert W. Staiger, "GATT-Think", NBER Working Paper Series, WP 8005, November 2000.

[109] $\tau = (1+t)$, $\tau^* = (1+t^*)$, where t and t* is official tariff rates of home and foreign countries respectively.

a welfare-maximizing government unconstrained by domestic political motivations.

Political Economy Approach

In this setting governments care about the distribution of national income among domestic interest groups. The desired local price, implied by the tariff choice, should reflect not only economic efficiency, but also domestic political concerns. Within the political economy literature, one possibility of political influence on trade policy arises from the fact that government is a "product" of representative democracy. In this case, as Mayer (1984) shows, the government sets its trade policy to promote *the interests of the median voter*, whose utility can be represented as a function of local and world relative price. Additionally, as Baldwin[110] observes, *the major approaches* to the political economy of trade policy, as represented in the work by Olson, Caves, Brock and Magee, Feenstra and Bhagwati, Findlay and Wellisz and Hillman, can also be represented in this way. Finally, *the lobbying models* of Grossman and Helpman fit within this understanding.[111]

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[110] Baldwin, Robert (1985), The Political Economy of U.S. Import Policy, the MIT Press: Cambridge.

[111] Olson, Mancur (1965), *The Logic of Collective Action*, Harvard University Press: Cambridge; Caves, Richard A. (1976), "Economic Models of Political Choice: Canada's Tariff Structure," *Canadian Journ al of Economics*, 9, May, 278-300; Brock, William A. and Stephen P. Magee (1978), "The Economics o f Special Interest Politics," *American Economic Review*, 68, May, 246-50; Feenstra, Robert and Jagdish Bhagwati (1982), "Tariff Seeking and the Efficient Tariff," in Jagdish Bhagwati, ed., *Import Competitio*

One more possibility is a government motivated by some independent ideological concerns. This model (proposed by Baldwin) includes political support constraint. In this setting, for example, a government can be represented as a “free trader”, whose policy choices are limited by the necessity to mobilize exporters’ support in favor of free trade balanced by the inevitability to take into account import-competing industries’ resistance.

Unilateral trade policies set by the governments in political economy understanding lead to the Nash equilibrium, which is assumed to be unique. It is also assumed that within the international trade agreement the governments seek to achieve Pareto-improvement in their economic conditions, especially in increased volume of trade. A trade agreement should entail therefore the reciprocal trade liberalization and lower than Nash tariffs. The Nash equilibrium derived from political economy model is

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n and Response, University of Chicago Press: Chicago; Findlay, Ronald and Stanislaw Wellisz (1982), “Endogenous Tariffs, the Political Economy of Trade Restrictions and Welfare,” in Jagdish Bhagwati, e d., *Import Competition and Response*, University of Chicago Press: Chicago; Grossman, Gene M. and Elhanan Helpman (1994), “Protection for Sale,” *American Economic Review*, 84, September, 833-50; Grossman, GeneM. and Elhanan Helpman (1995), “TradeWars and Trade Talks,” *Journal of Political Economy* , 03, August, 675-708.

indeed inefficient. The condition that trade agreement (or actually tariffs set under some specified circumstances) must be on the efficiency frontier is not met.[112]

The overall outcome, though, is not very much different from the traditional economic approach to trade theory. *The essential difference of political economy approach is that it allows the efficient solutions to correspond to the broader set of potential outcomes, not only free trade.* It also includes the high probability of two countries taxing their imports as a politically efficient solution. Political considerations explain why unilateral and bilateral free trade policy is so rarely found in the real world and hardly a goal of a majority of trade agreements. Apart from that political economy approach adds little to the understanding of the purpose of multilateral trade agreements: their only goal is still to alleviate terms-of-trade Prisoners' Dilemma.

There is also one more important detail in the course of this discussion*: the interpretation of the terms-of-trade externality, especially in its practical application.* At the broadest level, the whole discussion above confirms a very simple notion: governments can gain from trade-policy cooperation, if otherwise each would try to shift costs of more protectionist trade policy on the other, resulting in globally

inefficient tariff choices. Terms-of-trade externality is a mean of shifting those costs. As Bagwell and Staiger stress there should be formulated an alternative interpretation of terms-of-trade externality, more relevant for the practical use.

The unilateral tariffs are inefficient for a plausible reason: the domestic government does not internalize the harm for foreign exporters that its import tariff implies. The larger the importing economy and the bigger monopsonistic power it represents, the more devastating the harm to foreign exporters is, since they have to lower their export price to a greater extent. In turn this leads to the deterioration of the foreign country's terms of trade. Moreover, when the domestic government raises a tariff, it simultaneously shifts in the *market demand curve,* which in reality epitomizes the main subject of trade negotiations – market access. The practical implications of these conclusions will be discussed in the next section. "Indeed, we may interpret "cost-shifting", "terms-of-trade gain" and "market access restriction" as three phases that describe the single economic experience that occurs when the domestic government raises its import tariff and restricts foreign access to its market."[113]

[113] Ibid

The Commitment Approach

This is a third approach to the study of trade agreements. It was proposed in the works of Carmichael, Staiger and Tabellini, Gruenspecht, Lapan, Maskin and Newberry, Matsuyama, Tornell, Devereaux, Brainard, Mayer, McLaren, Grossman and Maggi, Maggi and Rodriguez, Krishna and Mitra[114].

The commitment approach centers on the game between each government and its private sector. In this setting a government makes its policy decision and after that agents in private sector chose their production levels or/and investment volumes. The main point here is that a government could have too much flexibility in setting its

[114] Carmichael, C. (1987), "The Control of Export Credit Subsidies and its Welfare Consequences," *Journal of International Economics*, 23, 1-19; Staiger, Robert W. and Guido Tabellini (1987), "Discretionary Trade Policy and Excessive Protection," *American Economic Review*, 77, December, 823-37; Staiger, Robert W. and Guido Tabellini (1989), "Rules and Discretion in Trade Policy," *European Economic Review*, 33, 1265-77; Staiger, Robert W. and Guido Tabellini (1999), "Do GATT Rules Help Governments Make Domestic Commitments?," *Economics and Politics*, July, XI.2, 109-44; Gruenspecht, Howard K. (1988), "Dumping and Dynamic Competition," *Journal of International Economics*, 25, 225-248; Lapan, H.E. (1988), "The Optimal Tariff, Production Lags, and Time Consistency," *American Economic Review*, 78, 395-401; Maskin, Eric and David Newberry (1990), "Disadvantageous Oil Tariffs and Dynamic Consistency," *American Economic Review*, 80, 143-56; Matsuyama, Kiminori (1990), "Perfect Equilibria in a Trade Liberalization Game," *American Economic Review*, June, 480-92; Tornell, Aaron (1991), "On the effectiveness of Made-to-Measure Protectionist Programs," in Elhanan Helpman and Assaf Razin, eds., *International Trade and Trade Policy*, MIT Press: Cambridge; Brainard, Lael (1994), "Last One Out Wins: Trade Policy in an International Exit Game," *International Economic Review*, 35, 151-72; Devereux, Michael B. (1993), "Sustaining Free Trade in Repeated Games without Government Commitment," mimeo, Queens University, etc.

trade policies, so if it makes policy decisions before the private sector determines production levels, it should take into consideration both producer and consumer options. Therefore, a government prefers to discharge policy adjustments after producers set up their variables in order to limit further control only to consumers' behavior, such that the tariffs would not affect production. The problem with this sequence arises when there is a possibility of information leakage or private actors can understand government incentives at least reasonably well. Producers anticipating certain governmental actions can, therefore incorporate them into their business strategies and the whole work of an economy becomes distorted. The distortion in production decisions is the cost of too flexible trade policy.

Within this framework the welfare-improving role of a trade agreement includes the possibility for the government to commit to its preferred tariff, determined after the production decisions are made. The commitment role of a trade agreement is different from the terms-of-trade considerations.

Maggi and Rodriguez[115] offer the following model of the commitment approach. They focus on the small-country case, where terms-of-trade externality is eliminated. There

[115] Maggi, Giovanni and Andres Rodriguez-Clare (1998), "The Value of Trade Agreements in the Prese nce of Political Pressures," *Journal of Political Economy*, 106.3, 574-601.

is a possibility for one of domestic sectors to form a lobby, and it is assumed that a government values the contributions of the lobby.[116] "The political process can potentially distort the equilibrium allocation of resources: the politically organized sector may be larger than it would become under the free trade, as firms invest in this sector in order to enjoy the protection that their contributions to the lobbying induce. This distortion in turn can give the government an incentive to commit to free trade, and it is assumed that the government can accomplish this by joining a pre-constituted free-trade agreement."[117] With the help of this commitment a government can ultimately achieve the reallocation of distorted investments into the most efficient economic sectors, while there is a cost of this commitment for the government: the foregone contributions from the lobby. Whether the government chooses a free-trade commitment depends on the special features of the political process. Firstly, the position of the government vis-à-vis the lobby should not be very strong, so that it could not extract too significant rents from the lobby. Secondly, the government's responsiveness to contributions relative to the goal of increasing national welfare[118] should not be too high or too low. If it is high the commitment is not likely to be

[116] In the same way as it was formalized in the model of Grossman-Helpman in Grossman, Gene M. an d Elhanan Helpman (1994), "Protection for Sale," *American Economic Review*, 84, September, 833-50.

[117] Bagwell, Kyle and Robert W. Staiger, "GATT-Think", NBER Working Paper Series, WP 8005, November 2000

[118] This is still assumed an important factor, determining in part the dynamics of electoral activity along with the contributions from various lobbying groups.

credible (the government is too reluctant to forego political contributions). If it is low the investment distortions are in any event not too catastrophic.

This is not the only commitment problem that a government could face, of course. In accordance with the Matsuyama's model[119], a government could be interested in the lifting of protection of some industry, once an industry invests sufficiently in cost reduction. If the government presumes that the protection would not be lifted in case the cost reduction or some additional investments do not occur, the commitment problem arises, since the private sector can reasonably well anticipate or acquire (due to corruption of state apparatus) the information about future governmental actions. Thus, the unintentional disclosure of information could undermine government's commitment to facilitate industry's restructuring through private sector's deliberate abstention from necessary investments, capacity reduction and staff optimization to ensure, that government will not have an incentive to lift trade protection ex-post.

If government is not strong enough to commit to industry reforms by itself, it could use a trade policy to achieve credibility of the commitment. A trade agreement actually can serve this purpose since country's trading partners possess enough power

[119] Matsuyama, Kiminori (1990), "Perfect Equilibria in a Trade Liberalization Game," American Econo mic Review, June, 480-92.

to credibly threaten trade retaliation if trade liberalization does not occur. Whence trade liberalization becomes a preferred strategy for the government even if industry's restructuring and investments do not take place, which in turn forces import-competing industries to restructure. However, the scheme proposed by Matsuyama is unlikely to hold in every case. First of all, for self-fulfilling domestic restructuring to occur, considerable financial flows should exist within the industry. Next, the industry under reckoning should be potentially competitive, so that the future benefits would outweigh current costs. If the industry is a sunset one without any hope even after restructuring, its representatives are likely to lobby in the government for the alternative means of protection, since otherwise it is doomed to die. If the sector is big enough and politically sensitive, the probable outcome could include lax competition policy (exemptions), subsidization or other regulations. At last, the size of the industry within the country in comparison with its foreign competitors also matters, as well as the bargaining power of the home country.

In sum, the commitment approach provides a distinct purpose for the existence of multilateral trade agreement by suggesting that such coordinating agreements can supply governments with the additional tools in strategic games with their own private sectors. Interestingly, according to the Bagwell and Staiger's view, none of the

approaches imply distinct political considerations as an indispensable part.[120] They also come to the conclusion that competition policy and trade policy are substitutable tools for regulating the degree of market access and that governments should regulate international trade only through "international instruments" – tariffs leaving competition policy for strictly domestic usage.

Political factors, however, matter in defining broader political motivations that political economy models capture. "This conclusion carries with a fundamentally different modeling implication, as it suggests that the (politically augmented) terms-of-trade and commitment theories provide the necessary building blocks for a modeling framework with which to interpret and evaluate GATT and its features."[121]

Alternative and Complementary Approaches: Informational Role

The purposes for the establishment of a multilateral trade agreement listed above are not exhaustive. There is another potential role of the WTO, which actually does not contradict the previously delineated functions. As it was mentioned by Thomas

[120] Bagwell, Kyle and Robert W. Staiger, "GATT-Think", *NBER Working Paper Series*, WP 8005, November 2000

[121] Ibid

Hungerford and Dan Kovenoch and Marie Thursby[122], the dispute settlement procedure may also act as an information-gathering agency that is able to discern between true violations of the agreement and mistaken perceptions, thus facilitating the use of bilateral reputation mechanism to support cooperation[123]. The emphasis here is on bilateral monitoring, since the dispute settlement can improve monitoring by the country directly affected by the trade policy.

In addition Maggi[124] concentrates on two other roles that WTO dispute settlement can perform. First, it can verify violations of the agreement and inform third countries, thus facilitating multilateral enforcement efforts. Second, it can promote a multilateral rule-making procedure in place f a web of bilateral negotiations. The emphasis on two-countries models in the papers mentioned above precludes them from capturing these functions.

The idea underlying the potentially important informational role, distinguished by Maggi, is as follows. Suppose country A commits a violation against country B, and

[122] Hungerford, Thomas, "GATT: A Cooperative Equilibrium in a Non-Cooperative Trading Regime?", *Journal of International Economics*, November 1991, 31 (3-4), pp. 357-69; Kkovenoch, Dan and Thursby, Marie, "GATT, Dispute Settlement and Cooperation", *Economics and Politics*, March 1993, 4 (1), pp. 151-70

[123] Giovanni Maggi, "The Role of Multilateral Institutions in International Trade Cooperation", *The American Economic Review*, Vol. 89, No. 1. (Mar., 1999), pp. 190-214

[124] Ibid

this violation is observed by country B, but not by the rest of the trading community. The role of the dispute settlement system in this case is to identify the violation and bring it to the attention of other WTO Members, exposing the offending country to the loss of reputation in the trading community. In this case the monitoring is undertaken not only by the involved countries, but by the third parties as well. The second important function of dispute settlement arises, when a violating Member is placed under the risk to lose the cooperation of other Member-countries.

There are several ways in which WTO community can respond o a violation of the Agreements. Firstly, WTO Members can withdraw trade concessions to the defecting country. For example, in the interpretation provided by several scholars[125], Article XXIII of the GATT Agreement provides for the possibility of repeatedly offending country from the GATT.[126] Secondly, WTO Members can impose costs on the offending government in more subtle ways, by withdrawing some of their "goodwill" toward that government. WTO Members can be less forthcoming with the offending

[125] John Jackson, 1969, pp. 186 – 187; Michael Finger, 1993 (?), cited from Giovanni Maggi, "The Role of Multilateral Institutions in International Trade Cooperation", *The American Economic Review*, Vol. 89, No. 1. (Mar., 1999), pp. 190-214

[126] Despite the fact, that in theory this possibility exists, it sees a bit unlikely to occur in practice, since the whole WTO system is built on the principle of promoting cooperation and mutually benign attitude between countries, notwithstanding the fact that they can periodically violate the Agreements, see or example, Kym Anderson, "Peculiarities of Retaliation in WTO dispute settlement", *World Trade Review* (2002), 1:2, 123-134

government in subsequent negotiations, in the same or related areas of cooperation; they can be more reluctant to enter new agreements with the offending country. If trade liberalization takes place in a gradual fashion, third countries can slow down the liberalization process vis-à-vis the offending government. Also, third countries can reduce their cooperation with the offending country at the level of institutional procedures. For example, if country A does not follow the recommendations of a Panel or the Appellate Body, third countries may feel free to do the same in the subsequent disputes against country A.

However, the second option presented by Maggi[127] seems rather implausible, since it places under doubt the existence of WTO dispute settlement as such. The main meaning of WTO dispute settlement constitutes the limitations imposed on unlawful and discretionary actions by governments in trade policy area, notwithstanding the number of previous violations made by some of them. Those "non-cooperative" actions from the third countries toward a violator could be traced in the application of non-tariff barriers, which include among others competition, environmental and trade policy requirements, but this issue demands additional research.

[127] Anyhow, Maggi considers them as *potential*

Anyway, the statistics of trade disputes witnesses that among the most common violators of WTO Agreements, who even triggered retaliation against themselves, are the major participants – US and EU. Their exclusion from the WTO is really unlikely. The problem of confidence exists, nevertheless, but the line goes between developed and developing countries, in such a way that functions mentioned by Maggi can be actually utilized, but only in one direction. In reality developed countries can become less cooperative towards developing countries, which in turn may behave in the same way, but would never achieve the same results due to the power imbalances. The failure of Cancun Ministerial emphasizes that this threat actually persists. As it was pointed out by some WTO commentators, probably the main cause deterring even strong countries from the outright violations of WTO rules is the fear of a systematic breakdown in multilateral cooperation.[128]

Moreover, further in his article Maggi says: "with regard to the role of multilateral punishment threats, the model[129] shows that a multilateral mechanism of enforcement is desirable, but third-party sanctions should be "minimal". [They] should be

[128] Ex-Director General of GATT Arthur Dunkel, for example, repeatedly pointed on this feature

[129] Model employed in Giovanni Maggi, "The Role of Multilateral Institutions in International Trade Cooperation", *The American Economic Review*, Vol. 89, No. 1. (Mar., 1999), pp. 190-214

threatened only for certain violations, namely those that are hard to deter with bilateral sanctions alone."[130]

[130] Ibid

3.3 Trade Policy Tools

Trade Negotiations

The purpose of trade agreement is not the only question we should ask about it. A fundamental question that remains is how governments might configure their negotiations? Negotiations between governments are intended to move their trade policy decisions from the non-cooperative Nash equilibrium to the contract curve. "There is no a- priopri reason to expect that governments would choose a political optimum, because political optimum over any other point on the contract curve, and indeed, the outcome ultimately depends on the structure of negotiations." [131] Jackson [132] distinguishes between "power-based" and "rules-based" approaches to trade negotiations.

When seeking a reciprocal trade agreement, governments require an approach to negotiations, which serves to move tariffs from the inefficient disagreement point to

[131] Bagwell, Kyle and Robert W. Staiger, "GATT-Think", NBER Working Paper Series, WP 8005, November 2000

[132] Jackson, John (1997), The World Trading System, 2nd edition, The MIT Press: Cambridge, pp. 109-112

the contract curve. One possibility here is a "power-based" approach, when the governments bargain over tariffs in a direct fashion that is not determined by any rules. The Nash Bargaining Solution can induce the politically optimal tariffs only if the countries are symmetric. If the domestic country is relatively more powerful of the two, such that its benefits in Nash equilibrium without trade agreement is always more than that in the political optimum.[133] As such, power based approach to negotiating trade agreements would lead to the tariff choices on the contract curve, and any divergence in these outcomes from the political optimum could be said to reflect "power asymmetries" across negotiating partners.

An approach adopted by the countries under the GATT Agreements, however, is not power-based avenue. There is a certain set of rules, written as well as implicit, underlying trade negotiation procedures among countries. *The main purpose of the GATT rules in this setting is therefore to eliminate power asymmetries among Member countries in such a way that leads to the politically optimal tariffs.*

[133] If the home country is more "powerful", its satisfies the following agreement: $(W^{po} - W^{N})/(- W^{po}{}_{pw}) < (W^{po*} - W^{N*})/(W^{*po}{}_{pw})$, where W^{po}- domestic country's welfare in "political optimum", W^{N}- domestic country's welfare in Nash equilibrium, W^{po*}, W^{N*} - the same for the foreign government

As Bagwell and Staiger put it, the question could be formulated even more starkly: "Do GATT rules serve to induce large countries to behave as if they were small countries, and thereby guide the outcome of trade negotiations toward political optimum?"[134]

The Enforcement of the WTO Agreements

The enforcement problem constitutes the most important challenge for sustainability of any international trade agreement. As soon as the agreement is signed, all Member-governments faces the short-term incentive to increase the protection of domestic import-competing sectors at more than efficient rate in order to reap terms-of-trade gains. Thus an enforcement procedure, which includes punishments for deviating governments, is indispensable for any long-standing trade agreement.

The enforcement procedure comprises the equivalent withdrawal of concessions: on the voluntary basis (compensation) or as a sequence of trade retaliation. In fact, tariffs that governments achieve through the trade negotiations should ideally represent on the one hand a politically optimal outcome, and on the other hand, they should fulfill

and Robert W. Staiger, "GATT-Think", NBER Working Paper Series, WP 8005, November 2000

the requirement of being balanced between the short-term gains of deviation and long-term loss from potential retaliation of other trading partners. In this case, a trade agreement could be “self-enforcing”.

In reality, however, accomplished multilateral tariff choices must not necessarily be fully efficient from economic and political point of view. They should provide Pareto-improvement in welfare for both governments comparing with non-cooperative Nash equilibrium, but power distortions may persist. Moreover, the balance, once achieved, may subsequently be upset as underlying features of the trading environment may change, and attempts to rebalance the agreement may arise.

If viewed under the repeated games’ framework[135], the formal enforcement approach taken by repeated-game literature is broadly consistent with the views within the WTO system itself.

[135] As it was suggested in the works of McMillan, John (1986), *Game Theory in International Economi cs*, Harwood: New York; Dixit, Avinash (1987), “Strategic Aspects of Trade Policy,” in Truman F. Bewl ey, ed., *Advances in Economic Theory: Fifth World Congress*, Cambridge University Press: New York; Bagwell, Kyle and Robert W. Staiger (1990), “A Theory of Managed Trade,” *American Economic Revi ew*, 80, September 1990, 779-95.

There is an enforcement dilemma in the WTO: on the one side, it is designed to achieve the primary goal of any enforcement system – protection of an agreement from disintegration. On the other side, retaliatory withdrawals of concessions should not upset the equilibrium world price, which provided for the reciprocal concessions in the first place. To achieve a satisfactory trade-off is actually not that easy: punishment implies a withdrawal that could be greater or smaller than a violation, but unequal withdrawal would inevitably disturb the world relative price. Therefore, a multilateral trade agreement cannot be enforced at full: periodical violations are inevitable.

The second challenge to the trading system is the robustness of initial reciprocal granting of concessions, which establishes the "agreed" world price. *There is no obvious consensus on what kind of endogenous as well as exogenous factors can influence the efficiency of initially agreed world relative price or more precisely – the import demand curves of trading partners.*

Here the interrelation between trade and "global" competition policy arises: international cartels capable to fix prices across the borders can influence the world price directly irrespectively of competition policies that national governments adopt.

From this perspective the difference between labor and environmental policies versus competition policy is becoming clear: the former two are unable to influence world price directly and independently, and therefore would not necessarily require the adoption of international standards.

Equivalent Withdrawal of Concessions: Flawed Nature of Retaliation

Are there any difference in the concepts of equivalent withdrawal of concessions and retaliation? The answer is a yes. Retaliation has in the first place something to do with the enforcement of a trade agreement, while an equivalent withdrawal of concessions could be practiced as a tool for re-balancing an agreement should the trade environment change.

The use of retaliation under the WTO is not frequent. Nevertheless, recent dynamic shows that forceful withdrawals will potentially be used more frequently in the future.

The first two uses of retaliation occurred in the late 1990s (*Bananas* and *Hormones*

cases)[136] and involved two largest WTO members: the United States and the European Union. The latest case of retaliation occurred in 2003 in conjunction with the safeguard measures imposed by the United States on steel imports. Among the complainants were the European Communities as well. Fortunately, the trade war did not erupt, since President Bush ended safeguard measures 76 months ahead of schedule[137].

The World Trade Organization had ruled the temporary steel safeguards illegal in a decision upheld on appeal[138]. Maintaining the tariffs would have discredited the group, undermined international trade agreements, and provoked retaliation.

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[136] European Communities – Regime for the Importation, Sale and Distribution of Bananas: Recourse to Arbitration by the European Communities Under Article 22.6 of the DSU, WT/DS27/AB/R, 9 April, Geneva: World Trade Organization, 1999; European Communities – Regime for the Importation, Sale and Distribution of Bananas: Recourse to Arbitration by the European Communities Under Article 22.6 of the DSU, WT/DS27/AB/RECU, 24 March, Geneva: World Trade Organization, 2000; European Communities – Measures Concerning Meat and Meat Products (Hormones): Recourse to Arbitration by the European Communities Under Article 22.6 of DSU (US complaint), WT/DS26/AB/R, 12 July, Geneva: World Trade Organization, 1999

[137] Bob Tippee, "Bush makes right move with the end to steel safeguards", Oil & Gas Journal, 15 December, 2003, Vol. 101, Issue 48, page 80

[138] Jeffrey Sparshott, "Pressure Mounts for US to Repeal tariffs on Steel", Knight Ridder Tribune Business News, Washington: Nov. 12, 2003, page 1; "Japan calls for Immediate end to US Steel Safeguards", Jiji Press English News Service. Tokyo: Nov 20, 2003. p. 1; "Bush Weighs Softer Stance on Steel; Compromise on U.S. Tariffs Is Pondered as WTO Edict Opens Way to Retaliation", Wall Street Journal, New York, Nov, 12, 2003, pg. A.2.

The European Union was ready to impose $2.2 billion worth of sanctions on US products selected to impose maximum political damage on the US president unwilling to look beyond steel-producing states. Japan planned sanctions worth $100 million/year. In the US, according to some analysts, the tariffs were hurting steel consumers more than they were helping steel producers.

For Bush, political metrics of the decision couldn't have been clearer. Hanging tough with tariffs would have played well in Ohio, Pennsylvania, and West Virginia. With steel unions already supporting Democratic challengers, though, the prize for Bush was limited. And it would have come at the cost of higher-than-necessary steel prices throughout the US, retaliation from Europe and Asia, and general horror over the implicit renunciation of trade. Thus, the threat of retaliation seems to be helpful in this case. There are, however, some peculiarities in existing WTO dispute settlement system that make it inherently unfair and inefficient from the economic point of view. Those features are discussed next in more detail.

The procedure for retaliation is as follows[139]. In case a WTO dispute settlement Panel finds that some member country's policy is inconsistent with the WTO Agreements in general and with member's commitments in particular, there is a "reasonable period of time" that is allowed for bringing the measure into conformity.[140] In practice the period provided for the reforming of a measure could constitute from 3 to 15 month. If a member has failed to make appropriate changes into its policy, the respondent should start negotiations with the complainant to designate a mutually acceptable compensation. If no satisfactory agreement occurs within 20 days after the expiration of the "reasonable period of time", a complainant has the right to ask the WTO's Dispute Settlement Body for authorization of retaliation or for "suspension of concessions" in WTO language[141]. The determination of the amount of retaliation is usually referred to the Arbitrator, unless there is an agreement on the issue between the complainant and respondent, and he assigns it within 60 days after the end of the "reasonable period of time".[142] The main goal of the Arbitrator is to decide whether the proposed level of retaliation is equal to the damage done by the original measure under consideration. The decision of the Arbitrator is final: there is no appeal option

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[139] Kym Anderson, "Peculiarities of Retaliation in WTO dispute settlement", *World Trade Review* (2002), 1:2, 123-134; Giovanni Maggi, "The Role of Multilateral Institutions in International Trade Cooperation", *The American Economic Review*, Vol. 89, No. 1. (Mar., 1999), pp. 190-214.

[140] Article 21.3 of DSU

[141] Article 22.2 of DSU

or the opportunity to seek a second arbitration. The DSB will accept the arbitration and grant the right to retaliate to the complainant, unless there is a consensus not to do so.[143]

Among others Kym Anderson clearly finds that there is an apparent procedural dilemma in this retaliation procedure. "Suppose that the respondent takes the full "reasonable period of time" before announcing a reform of the offending policy measure. If the complainant believes that the reform is insufficient to make the policy WTO consistent, there is an opportunity to refer the matter to the Panel again. The Panel in turn must report within 90 days of that request.[144] If the respondent is unhappy with the Panel's ruling, another 45 days could be required for the Appellate Body to reconsider the decision. The apparent dilemma is that even if the Panel or Appellate Body finds the policy to be still WTO inconsistent, the 20 days after the "reasonable period of time" for a complainant to lodge a request to retaliate will have expired. This interpretation of DSU Articles 21.5 and 22 suggests there could be an endless loop for litigation."[145]

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[142] Article 22.6 of DSU

[143] Article 22.7 of DSU

[144] Article 21.5 of DSU

[145] Kym Anderson, "Peculiarities of Retaliation in WTO dispute settlement", *World Trade Review* (2002), 1:2, 123-134

Enforcement and Retaliation[146]

The dispute resolution procedures of the WTO allow sanctions to be imposed when a country is unwilling to bring a WTO-inconsistent measure into conformity with the rules. Unfortunately, the retaliation itself has some undesirable economic features. The provision to retaliate and rules for doing so involve an apparent procedural dilemma. After the DSB grant the authority to retaliate or "suspend concessions", the parties have a chance to agree on the amount of retaliation. Should the respondent object to the amount of suspension proposed by the complainant, the matter is referred to the Arbitrator.

The task of the Arbitrator under Article 22.7 of DSU is to find out whether the level of retaliation proposed is "equivalent" to the level of damage or "nullification or impairment". The decision made by the Arbitrator and cannot be appealed. The type of retaliation most commonly considered is the list of products exported by the

[146] See, Joost Pauwelyn, "Enforcement and Countermeasures in the WTO: Rules are Rules-Toward a More Collective Approach", *The American Journal of International Law*, Vol. 94, Issue 2 (April., 2000), 335 – 347; Kym Anderson, "Peculiarities of Retaliation in the WTO Dispute Settlement", *World Trade Review (2002)*, 1:2, 123-134; Wifred J. Ethier, "Punishments and Dispute Settlement in Trade Agreements: The Equivalent Withdrawal of Concessions", Department of Economics, University of Pennsylvania, manuscript, First version January 16, 2000, current printing April 25, 2002

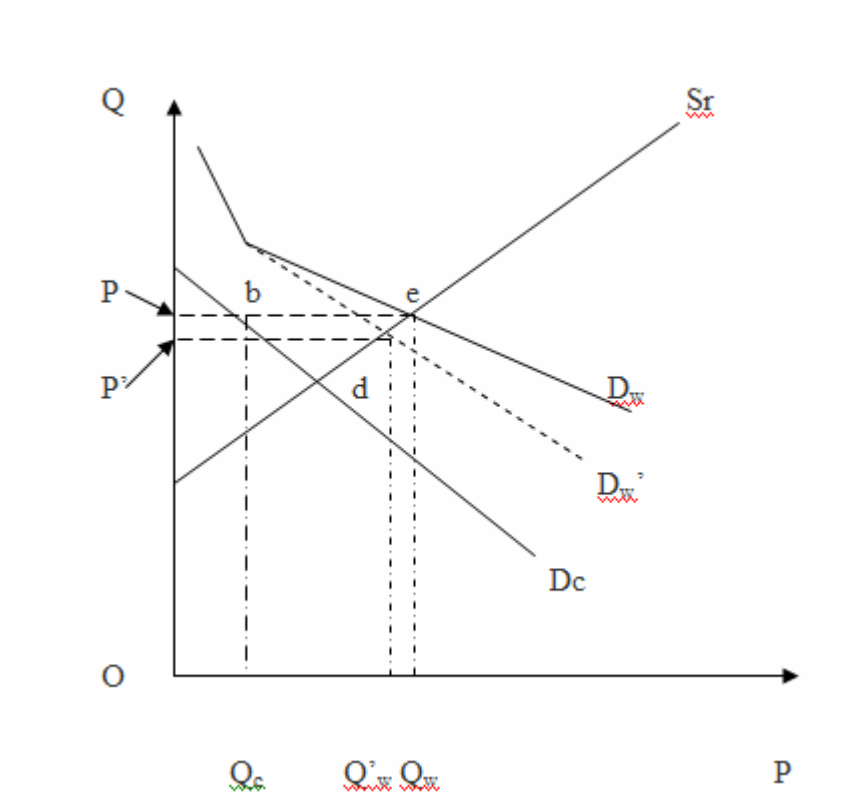
respondent on which complainant will impose prohibitive tariffs. The gross value of imports to be prohibited (the average for the three most recent representative years for which the import data are available) should match the value of complainant's exports excluded by the respondent's measure, inconsistent with the rules of WTO.

However, *there is a problem with this equivalence*. The assurance that the gross value of retaliation is equal to the gross value of injury incurred by the complainant due to the respondent's measure does not mean that retaliation has the same economic welfare effect on the respondent that the measure initially had on the complainant's welfare.

Bilateral trade provides certain leverage for both parties to retaliate, but those opportunities are distributed unequally in accordance with the distribution of "economic power", and the severity of retaliation will depend on the elasticity of world demand, country's domestic demand and other country's domestic supply.

Consider the chart below:

CHART 1: ENFORECEMENT AND RETALIATION - 1



Where Sr is a respondent's excess supply curve; Dc is the complainant's import demand curve; Dw is the world import demand for it. The assumption of this model is perfect competition and the absence of other distortions.

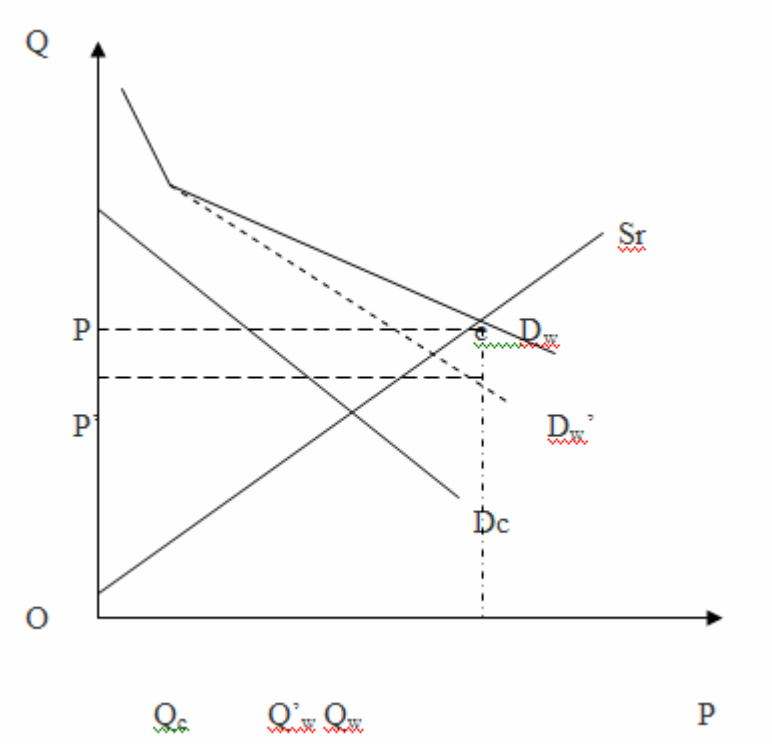
The quantity of a good traded at the world's price is Qw from which Qc goes to the complainant. Now that the retaliation occurs the quantity Qc accruing to the complainant's market is eliminated, but it induces the decrease of world demand for respondent's exports to Qw', that means the fall in world demand is less than Qc. The

gross value of imports to be prohibited is the area PbQcO, whereas the respondent's net loss because of that prohibition is the area PeQwdQw'P'. The respondent's domestic welfare loss because of that trade prohibition is just an area of PedP'. The part under the supply curve represents the costs of production and they are saved, since production does not occur.

The loss of domestic welfare by the respondent will depend on the elasticity of its excess supply as well as on the elasticity of complainant's demand for imports and the elasticity of world demand for those imports as a whole.

Consider the following graph:

CHART 2: ENFORCEMENT AND RETALIATION - 2



See, that even in this case the value of imports prohibited due to retaliation is more than the welfare loss in the respondent country. In general the economic loss of the respondent is larger absolutely, and relative to the gross value of trade curtailed, the steeper (and less elastic) is the respondent's supply curve. We can also infer from the graph that the less elastic the world demand for those exports (due to the absence of close substitutes or the limited number of suppliers) and the more elastic the complainant's import demand (may be thanks to specific consumer preferences), the more injurious retaliation will be. This is quite intuitive, since the more respondent's exports designated for retaliation go to the complainant, the more efficient retaliation will be, since respondent can use its monopsonistic power. Remarkably, the retaliation against a monopolistic respondent is unlikely to be effective.

In the model presented above, the possibility of the oligopolistic structure of the world market is ruled out (the assumption of perfect competition). If the oligopoly is indeed the case, a chance to use strategic policy exists. For example, the prohibition of imports from the respondent, when there are only two or three main competitors in the world, will considerably improve the relative position of respondent's competitors even if the gross loss of domestic welfare is not that big. However, again the

complainant should possess at least a certain degree of monopsonistic power.

All those considerations have underscored the point that insuring the reduction in the value of imports from the respondent, due to retaliation, matches the reduction in the value of imports from the complainant, thanks to the WTO-inconsistent measure used by the former.

This retaliation is not costless to the complainant either. Cost stems from choosing to forego the imports from the respondent, which actually could be the cheapest. Thus, retaliation, as the case of any discriminatory tariff setting can do, can cause trade diversion and misallocation of resources. The economic cost is smaller the flatter (or more elastic due to the presence of close substitutes) is Dc (which was shown in the graph). The injury for the complainant could be offset somewhat by the trade with producers of close substitutes, but this quantity was necessarily be smaller, since otherwise the complainant would elect to trade with them at the first place.

The political sensitivity of the target product is likely to be the key point in choosing it. We should expect increased political sensitivity in sectors that incurred significant sunk cost and currently are struggling from the fall in world prices. Obviously, for

them the foreclosure of any external market could be especially detrimental. Unfortunately, the most troubled sectors tend to be in import-substitution. Hence it is not clear whether the complainant can actually find the sector, which is sensitive enough at the first place and which exports a considerable amount of output to its market. The problem is even more difficult if a complainant is a small country, which does not possess market power.

Thus, trade loss equivalence would never translate into equivalent damage to economic welfare, except by coincidence. Additionally a complainant will lose economically during the retaliation period from the import restrictions it imposes on the respondent's trade. The retaliation by its very nature contradicts the principle of trade liberalization. On the other hand it could induce additional compliance from the members and stop them from deviation.

The concept of equivalence rests also on the notion of fairness. But in the context of WTO it is violated at least at four respects. First, past practices inconsistent with WTO and damaging for the complainant respondent's measures go uncompensated. Second, the complainant economy is not helped, but harmed by retaliation, which is the standard cost of protectionist barriers. For small or developing economies,

confronted with much larger trader, it could be a particularly difficult situation. The large country may deter a small one seeking recourse to DSU. In other case, when the Arbitrator has ruled in favor of a small country, the big one can simply adopt retaliation. Third, retaliation does nothing to help an export industry in the injured country. Due to the imposition of retaliatory prohibitive tariffs, the import-competing industries of the complainant enjoy a temporary assistance. Fourth, the respondent's industries that are harmed by the retaliation are not those that have been benefiting from the WTO-inconsistent measure. They are typically chosen on the basis of political sensitivity.

For non-exporting Member, the situation with retaliation is even more detrimental. Although the Panel ruled in its favor, it cannot retaliate in practice, since it does not have any concessions to suspend (it does not export to the respondent, and in accordance with the principle of reciprocity, it did not give any concessions to the respondent). So the retaliation can hardly be implemented in practice by a small country.

3.4 The GATT / WTO legal practice and competition policy considerations: market access revisited

The concept of market access – the common place in trade and competition policies

Within neoclassical economics "market access" is usually associated with the import demand curve, which is becoming available for foreign suppliers when tariffs are reduced or regulations are lifted[147]. The obvious problem with this definition is that it is too vague to be readily applicable in practice. Moreover, there is another problem. In the WTO legal practice it has clearly identified that the Contracting Parties make reciprocal concessions to each other, but "***the commitments they exchange in negotiations are commitments on conditions of competition for trade, not on volumes of trade"[148].*** In this regard we should clearly distinguish between the concept of market access as an import demand curve and "the possibility to compete for trade" along with domestic and foreign firms from other countries without any discrimination. Thus, the concept of market access deserves further elaboration. In the Figure 1 the underlying concepts are presented in a graphic fashion.

[147] Kyle Bagwell and Robert Staiger generally argue that the effects of tariff reductions and other policies' liberalization are similar and interchangeable.

[148] *EC – Oilseeds I (GATT)*, Report of the Panel, L/6627 – 37S/86, *25 January 1990, para. 150*

The main purpose of the trade agreement identified by Kyle Bagwell and Robert Staiger is to prevent the governments from setting unilateral trade policies. It reads: "Government A's calculus of winners and losers neglects an important party: the exporters from country B. Exporting firms would naturally be expected to bear some of the incidents of a tax. Put differently, if the import tariff on a good is raised by a dollar, then the price of a good in country A (importing country) is likely to rise by something short of a dollar. Some of the tariff hike would then be absorbed by the exporting firms, which is to say that the export price they receive would be reduced. Government B, which cares about the profits earned by its exporters, thus experiences a cost when government A selects a higher import tariff. Since government A does not internalize the full (worldwide) costs of a higher import tariff, it will set a tariff that is higher than would be efficient from a worldwide perspective, where efficiency is judged in relation to the objectives of governments A and B. Of course, government B views the situation in a symmetrical way, so that the governments in a world without a trade agreement have a problem: tariffs are too high."[149]

In the WTO legal practice, however, the question of market access is routed in a

[149] Kyle Bagwell and Robert Staiger, Petros C. Mavroidis, "It's a Question of Market Access", *American Journal of International Law*, Vol. 96, 56 – 76, 2002

different way.

In *Kodak – Fuji* case, it was explicitly contended that "benefits of tariff concessions accruing under Article II consist ***of the legitimate expectation*** of market access opportunities, *or improved competitive conditions*, for imports created by the tariff concessions…." [150], thus there is an equivalence between "market access" and "improved market conditions" here.

In *EC – Bananas* (AB), the European Communities, in particular, submitted the following view, which reflects the general problem in matching "import demand curve" in theory with the "improved market conditions" of legal practice. Although, the disputed point is connected with the Agreement on Agriculture, it can also be viewed within more general terms: "First, the transition from a highly restrictive system, largely based on non-tariff barriers, to more open market access for agricultural products had to be progressive. Second, the process of reform initiated by the *Agreement on Agriculture* was aimed at achieving binding commitments in three areas: *market access*, *domestic support and export competition*. The fundamental achievement of this reform process was the obligation *to remove non-tariff barriers*

[150] *Japan – Measures Affecting Consumer Photographic Film and Paper, Panel Report*, WT/DS44/R, 31 March, 1998

and to convert them into tariff equivalents, including tariff quotas"[151].

The important issue is raised in this citation: to become a binding agreement, *market access concept*, which is understood, as an *import demand*, needs to be quantified. This kind of "calibration" should be made not only for the agricultural products, since in this area this concern is at least partially addressed, but for the majority of manufactured goods as well, where the problem is perceived as being solved. The current approach in the WTO legal practice, quite to the contrary, is focused on *"the equality of competitive opportunities"*, rather than on quantification of any kind.

This issue was addressed in detail on the very early stage in *EC – Oilseeds* case: "The approach of the CONTRACTING PARTIES reflects the fact that the governments can often not predict with precision what the impact of their interventions on import volumes will be. *If a finding of nullification or impairment depended not only on whether an adverse change in competitive conditions took place but also on whether that change resulted in a decline in imports*, the exposure of the contracting parties to claims under Article XXIII:1(b) would depend on factors they do not control; the rules on nullification and impairment could consequently no longer guide government

[151] *European Communities – Regime for the importation, Sale and Distribution of Bananas*, WT/DS27/AB/R, 9 September, 1997

policies. Moreover, the contracting parties facing an adverse change in policies could make a claim of nullification or impairment only after that change has produced effects. Such claims could consequently not be made to prevent adverse effects; they could only be made to obtain redress ex post. *If Article II were considered to be protecting expectations on trade flows it would be necessary for the CONTRACTING PARTIES to determine what export volumes a contracting party can reasonably expect after having obtained a tariff concession.* The Panel is not aware of any criteria or principles that could be applied to make such a determination. The Panel further noted that changes in trade volumes result not only from government policies but also other factors, and that, in most circumstances, it is not possible to determine whether a decline in imports following a change in policies is attributable to that change or to other factors. The provisions of Article XXIII:1(b) could therefore in practice hardly be applied if a contracting party claiming nullification or impairment had to demonstrate not only that an adverse change in competition has taken place but also that the change has resulted in a decline in imports."[152]

There is also an interesting elaboration of "market access" concept as provided *in Japan – Semiconductors*[153] case. The case as such is concerned with the Agreement

[152] *EC – Oilseeds I (GATT)*, Report of the Panel, L/6627 – 37S/86, *25 January 1990, para. 151*

[153] *Japan – Trade in Semiconductors*, Report of the Panel adopted on 4 May 1988 (L/6309 - 35S/116)

concluded between USA and Japan on 6 November 1986 in order to promote the international trade in semiconductors.

The European Communities brought a complaint that the Agreement is exclusionary and discriminatory with respect to the third countries. It reads: “The Arrangement contains three main sections. *The first section relates to market access*. It provides that the Government of Japan will impress upon the Japanese producers and users of semi-conductors the need *to aggressively take advantage of increased market access opportunities in Japan for foreign-based firms*, which wish to improve their actual sales performance and position. Specifically, the Government of Japan will provide further support for expanded sales of foreign-produced semi-conductors in Japan through the establishment of an organization. *It will provide sales assistance, quality assessment, research fellowship programs, exhibitions, etc., for foreign semi-conductor producers, and through the promotion of long-term relationship between Japanese buyers and foreign producers including joint product development programs*. On the other hand, the Government of the United States will impress upon the US semi-conductor producers the need to aggressively pursue every sales opportunity in the Japanese market and will also provide support for the activities of the organization

mentioned above."[154] The problem of market access here is addressed from the point of actual firms' behavior: "structural characteristics" of the market prevent advanced market access from working if domestic firms engage in certain collaborative behavior. In the Arrangement reached upon between the US and Japan on semiconductors, probably, the first attempt was undertaken to break the traditional conduct of the Japanese firms. International effects of the Arrangement may not be perceived as absolutely positive though[155]. Here the "structural paradigm" of antitrust theory is clearly dominating the discussion provided by European Communities.

It also reads: "In relation to monitoring and improvement of market access, MITI compiled on a quarterly basis Semi-Conductor Supply-Demand Forecasts. It sent out questionnaires to all manufacturers and major users of various semi-conductors to seek data on production, demand and other information. Based on the results of those surveys, and taking into account information from foreign markets and various research organizations, a report was drafted for the deliberation of the Semi-conductor Supply-Demand Forecast Committee, composed of users, manufacturers, academics

[154] The Agreement mentioned in the citation is an Arrangement concerning *Trade in Semi-Conductor Pr oducts* concluded between USA and Japan on 6 November 1986 in document L/6076. *Japan – Trade in Semiconductors*, Report of the Panel adopted on 4 May 1988 (L/6309 - 35S/116)

[155] The issue was substantively addressed in the EEC's complaints, *Japan – Trade in Semiconductors*, Report of the Panel adopted on 4 May 1988 (L/6309 - 35S/116)

and experts.

The forecast was formulated as a reference for manufacturers in their production schedules. MITI explained its objective to manufacturers and impressed upon them the need to reflect real demand in their production. Individual companies were expected voluntarily to bring their production almost in line with the forecasts, taking into account the appropriate total production. The forecasts were not legally binding and the Government did not allocate production volume to individual companies. For manufacturers to conspire on production volume was against the anti-trust laws in Japan."[156]

In fact, the Japanese government had been accumulating data about the real demand on semiconductors, which were used for the nation-wide control of production volume as well as some tacit coordination with the semiconductors' producers in the United States. The encouraged coordination between American and Japanese producers was used to widen US presence in the Japanese market. From the perspective of Japanese domestic competition law, the unlawful producers' behavior could have been admitted only in case of direct collusion among them in the

[156] *Japan – Trade in Semiconductors*, Report of the Panel adopted on 4 May 1988 (L/6309 - 35S/116)

allocation of production volumes.

However, “administrative guidance” of the Japanese government, as an “authorized” interference in order to prevent dumping, worked as tool to align production decisions as well. In particular, “The Director-General of the Machinery and Information Industries Bureau and the Minister of MITI organized meetings with producers and exporters (in September 1986, March and May 1987) to request that dumping should be avoided.

These requests represented general appeal, not legally binding. The likely consequences of disregarding these requests were pointed out. If requests were not complied with, they were repeatedly made by MITI.”[157] Manufacturers and exporters were required to report data on export prices, and periodically on costs to MITI. The data collection procedures for prices were established in accordance with Article 67 of the Foreign Exchange and Foreign Trade Control Law and Article 10 of the Export Trade Control Order. However, non-compliance in this regard would not lead to denial of export license or prohibition of exports. The existence or non-existence of injury in foreign importing countries was not taken into account by MITI in its

[157] Ibid

monitoring of costs and export prices. Also, MITI could not deny applications for export licenses due to inappropriate pricing.

The EEC has formulated the complaint in the following basic points[158]:

(1) The sector concerned was one in which Parties to an Agreement (USA and Japan) had at the time the dominant position in production and trade, and those products (semiconductors) were at the same time of fundamental importance to the industrial development of the Contracting Parties concerned (the EEC);

(2) EEC contended that the monitoring measures applied by the Japanese government, especially those vis-à-vis third country markets, contravened the provisions of Articles VI and XI[159];

(3) The provisions on access to the Japanese market included conditions for discriminatory implementation, contravening Article I[160];

(4) The lack of transparency surrounding the whole issue contravened Article X[161].

(5) Canada also submitted that in addition to the violations listed above, Article

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[158] *Japan – Trade in Semiconductors*, Report of the Panel adopted on 4 May 1988 (L/6309 - 35S/116), p. 8

[159] Article VI of the GATT-47 – "Antidumping and Countervailing Duties", Article XI of the GATT – "General Elimination of Quantitative Restrictions".

[160] Article I of the GATT-47 – "General Most Favored Nation Treatment".

[161] Article X of the GATT-47 – "Publication and Administration of Trade Regulations".

XVII:1 (c)[162] was violated and EEC agreed with the arguments advanced by Canada[163].

It is worth noting that the whole formulation of the appeal was accomplished in accordance with the "structural view on market access" and supported by the hypothesis of collusion between US and Japanese governments and private parties they represented.

In general, the EEC stated that the purpose of the Arrangement between USA and Japan was clear. "The implementation of the Arrangement had increased prices in the US market, thus placing US users at a disadvantage vis-a-vis their competitors in third countries and measures to increase prices artificially in those countries were therefore taken to the detriment of users in those countries. On the other hand, US producers and exporters of semi-conductors would, in the absence of such measures, remain

[162] Article XVII:1(c) of the GATT –47, "State Trading Enterprises". It reads: "No contracting party shall prevent any enterprise (whether or not an enterprise described in subparagraph (a) of this paragraph) under its jurisdiction from acting in accordance with the principles of subparagraph (a) and (b) of this paragraph. The principles are of non-discrimination (subparagraph (a)) and purchases and sales in accordance with commercial considerations, including price, quality, availability, marketability, transportation and other conditions of purchase or sale (subparagraph (b)).

[163] *Japan – Trade in Semiconductors*, Report of the Panel adopted on 4 May 1988 (L/6309 - 35S/116), p. 8

exposed to reported Japanese dumping in markets other than the United States."[164]

The EEC rejected the explanations given by USA and Japan that the provisions of the Arrangement were aimed at the avoidance of dumping in the US market and the circumvention of the Arrangement through the markets of third countries. "This argument would imply that all contracting parties could apply export controls in respect of any product of their choice to all destinations in order *to prevent circumvention and dumping on any one single market*. And they could do so with the agreement of only one contracting party, instead of with all parties concerned."[165]

In this case EC used the argument that had been extensively used in private antitrust litigation, and which implies that there might be controversies between trade and competition policies, when it comes to the agreed price settlements between parties when one of them threatens to file antidumping investigation against the other.

As Joel Davidow explains: "Issues of antitrust immunity and the GATT law become more complex in high-profile trade cases, in which governments take a leading role in

[164] Ibid: 9

[165] Ibid: 9

arriving at restraints on export competition."[166]

A case in point, discussed by Davidow, is the settlement of the 1982 steel cases. There, US steel companies filed more than 100 dumping and subsidy cases against imports from the European rivals. About thirty of the cases were dismissed at early stages due to various flaws. Nevertheless, Common Market and US trade officials, advised by their industry leaders, decided to negotiate a quota agreement that set quotas, limiting European exports to the US of virtually all types of steel, regardless of whether the affected steel product was the subject of a pending trade case, a dismissed trade case, or no trade case at all.

If such broad agreement had been negotiated among the companies directly, it clearly would have failed to pass the antitrust test. Nevertheless, since government officials had conducted the case in a manner that brought a waiver from antitrust responsibility. Establishing of the case in *Japan – Semiconductors by* EEC used the same scheme, but in the reverse direction.

[166] Joel Davidow "Antitrust Issues Arising out of Actual or Potential Enforcement of Trade Laws", *Journal of International Economics and Law*, pp. 681-693, 1999.

In *Japan – Semiconductors,* to implement the Third Country Market Monitoring provision of the Arrangement between USA and Japan, an export licensing system was used for the monitoring, according to which licenses were issued to applications, which respected certain price guidelines, i.e. a minimum price fixed for individual products. Japan and the United States directly produced, or controlled through overseas manufacturing plants, a pre-dominant share of world semi-conductor production.

Thus, the government-mandated export price control would have lead to a situation, in which importing countries would be forced to pay a price for such imports in excess of what normal conditions of competition would imply. This situation could have forced, induced or permitted Japanese producers to exercise quantitative export limitations, which could have subjected foreign competitors producing competing final products to considerable uncertainty and risks in their production plan or even prevented them from producing at all.

The Japanese government had also taken steps above and beyond its obligations under the Arrangement with the United States in part for the purpose of demonstrating its

desire to cooperate with the United States during earlier consultations under the Arrangement.

Thus, in November 1986, MITI had invoked the Export Trade control ordinance in order to prevent below-cost exports. Thereafter, in January 1987, Japan lowered the minimum level for export licenses from 1 million to 50,000 yen. In February 1987, Japan increased scrutiny of export license applications for third country exports in order to prevent grey market sales. In March 1987, the MITI Minister had convened an emergency meeting with the Chairman or President of each of the ten major semi-conductor companies to impress upon them the importance of avoiding dumping in third country markets.

Japan on its own side contended that “the relationship between price supply and demand in the semi-conductor industry was characterized by *a learning curve effect* in the sense that *an increase in production and productivity brought about a sharp decline in costs*. In these circumstances, the possible decrease in prices *was liable to create a high expectation of demand expansion, leading to capacity investment, over-production and excessive competition over market shares* ***(Dixit competition in quantities and then on the second stage in price)***.

These conditions of over-production and excessive competition **might have promoted a price war** and destabilize the balance between demand and supply. *On the other hand, if low-priced products were exported and regarded as dumped, or if low domestic prices prevented an increase in imports of foreign semi-conductors, international cooperation might be harmed. MITI's efforts to request manufacturers to align their production levels to reflect the real demand and to prevent dumping had not had a restrictive effect on exports, but were made with the objective of contributing to international co-operation.* Here, the economic efficiency concerns are obviously disregarded in order to promote international cooperation at the expense of global welfare.

From the perspective presented above, the objectives of the Arrangement between the US and Japan does not look like an attempt to prevent the deterioration of terms of trade for each country. On the contrary, they seem to be aimed at avoiding an uncontrolled increase in the market share by one nation at the expense of the other. This is especially the case, when diminishing costs marks the production under

scrutiny[167]. Definitely, "structural competition paradigm" informed the US trade authorities to the great extent. Uncontrolled expansion of the one nation's market share at the expense of the other was regarded as "unfair competition" and dumping even though the price of semiconductors might have been falling due to rise of production efficiency and "learning curve" effects. The increase in market share raised concerns about possible future monopolization of the world market with subsequent price hikes to the monopolistic level.

The dilemma of international trade in products with diminishing costs curve therefore may be characterized as follows. On the one hand, to exercise efficiency gains an industry in each particular country is dependent on the other nations' desire to provide access to their domestic markets[168]. On the other hand, each country is aware that if an industry in the other country is faster in reaching the critical volume of production its domestic industry can be left behind and deprived of the opportunity to attain necessary level of production. As Paul Krugman depicted it "the history of the industry matters."

[167] Diminishing costs could arise when an industry is characterized by a learning curve, economies of scale of various natures, or by significant fix costs of establishing production (natural barriers to entry) accompanied by negligible marginal costs of production.

[168] By assumption, domestic market is not deep enough to reach the volume of production necessary for exercising economies of scale at full.

If that kind of industries exists only in two countries in the world (like in Japan and the United States in this case), they can solve this problem through the voluntary mutual export restrains[169] or through the combined threat of the imposition of antidumping duties and voluntary export restrictions[170]. When proceeding to the multilateral setting though, the situation is becoming complicated due to the fact, that interests of consumers and producers in the third countries are disregarded. That is exactly what happened with EEC in *Japan – Semiconductors* case.

Within this framework, the basic concern of national governments is not terms-of-trade Prisoners' dilemma, since on the contrary the price of the imported good is decreasing, while the price of exported good is rising. In this case the problem can be characterized by "game-of-timing" in the context of Bertrand-like price competition. In non-cooperative setting, each country's industry would be inclined to over-invest into capacity building in order to reach first the threshold of efficient production with lowest marginal costs.

[169] In a symmetrical case, when both industries are located at the same point of learning curve or other economies of scale.

[170] This is indeed the case *Japan - Semiconductors*

The nature of regulated international trade, however, would generate an impediment: higher than necessary import tariffs destined to prevent competitors in other countries from attaining a dominant position. The globally efficient production level would not be touched. Unilateral free trade would induce a price war (Bertrand-like competition) and unproductive dissipation of resources. Negotiating of reciprocal concessions on non-discriminatory basis would not solve the problem, however, since the "game-of-timing" issue persists. Market access would be nullified or impaired as soon as the industry in one country would manage to reach the efficiency threshold first. Product differentiation has a potential to alleviate the dilemma.

If we alleviate the assumption that a domestic industry can reach productive efficiency contingent upon the access to foreign markets, the situation will complicate. The incentive to invoke "infant industry argument" would emerge in different countries in accordance with the size of their domestic markets. If a domestic market were large enough to achieve an efficiency threshold, a country would have an aptitude to block the access of its foreign competitors. If the development of this industry is contingent upon the access to foreign markets, it is unlikely to rise without international cooperation.

When it is allowed for imperfectly competitive markets with implicit “game-of-timing”, a common international agreement on competition for all industries is implausible, since every industry is characterized by its own form of marginal costs curve as well as the necessary volume of fixed costs.

Japan in *Japan – Semiconductors* case contended that since production costs decreased sharply as a result of the learning curve effects, and since most semi-conductors had a short life span, manufacturers tended to attempt to recoup their investments quickly by expanding production. They normally set price levels taking into account anticipated levels of supply and demand at a future period of time. This meant that typically the cost at the targeted production point would be lower than the current cost since a downward cost curve was expected.

Consequently, sales prices, though not intended, could possibly be found to be below cost. This problem involved some basic issues related to the method of calculating costs when long-term pricing practices of high-technology goods with rapid technological innovation were involved. In addition, it was observed that unit cost became higher as production decreased. Therefore, when a producer decreased his production, he was likely to set higher prices to reflect the higher production cost.

Thus, it was not abnormal that semi-conductor producers set higher prices in the process of adjusting production in accordance with the principle of profit maximization.[171]

The *Japan – Semiconductors* is particularly interesting, since in this case the competition policy concerns were addressed in the context of "market access" analysis.

In a communication to the members of the WTO Group on the Interaction between Trade and Competition Policies, the United States Government pointed out the following probable link: "We can observe a graduate evolution in trade policy toward a broader understanding of the potential impediments to market access. This evolution looks beyond broader barriers such as tariffs in order to secure other meaningful improvements in market access conditions, by turning attention to the range of barriers that affect conditions of competition in the market and that may restrict the ability of foreign firms to effectively operate in the given market."[172]

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[171] *Japan – Trade in Semiconductors*, Report of the Panel adopted on 4 May 1988 (L/6309 - 35S/116)

[172] WTO, "Communication from the USA to the Working Group on the Interaction between Trade and Competition Policy", *WT/WGTCP/W/66*, March 26, 1998

In sum, when we try to consider trade perspectives and tools in their entirety, we can observe that they are all built on the basis of nation-state concept, in which private parties are represented by their respective governments. This is the main reason why theoretically the broad competition policy agenda is not sustainable and even superfluous with respect to trade policy promoted by the government. When, however, we consider commitment approach, proposed by Maggi, the situation becomes different: private parties and government engage in certain relationship that affects the outcome for the whole trading system. The tools used by the world trading system are imperfect. Negotiation, renegotiation with equivalent withdrawal of concessions and retaliation are unable to solve the problem of enforcement. May be that makes the alternative Cordato approach more promising? Figures 4-11 are illustrating trade perspectives and trade tools.

CONCLUSION

Current world trading system is full of controversies. The complex of tools used for its consolidation (non-discrimination and reciprocity) and support (renegotiation and retaliation) are unable to make it sustainable enough. The major force that presses governments to abide is of psychological nature and connected to the inherent fear of total breakdown of international cooperation.

The interaction between trade and competition policies may be regarded as one of the fundamental issues of current system. The analysis shows that many provisions in the WTO Agreements and approaches of the Parties in dispute settlement practices are deeply rooted in “structural competition” approach to the antitrust theory, which showed itself as theoretically well-developed but relying too much on mentally constructed benchmarks such as “perfect competition”, “competitive markets” and “free trade”.

Economists working in neoclassical settings have constantly been trying to find an objective rationale for existing world trading system and partly succeeded in that, but their analysis came to the general conclusion that nothing should be changed in the

present system. All problems can be totally solved through enhancing flexibility of the working mechanisms. The reality does not generally align with their view. International competition for trade is multi-dimensional and contravene with the view that globally optimal level of market access could be reached exclusively through determining sovereign tariffs. Even much older “import discipline” hypothesis allows for that.

In this regard the introduction of elements of international framework on investments and “action rights” allowing incorporation of dynamic competition might serve as an alternative road to reforming the WTO system.

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APPENDICES

FIGURES 1 to 11